

Control Number: 51415

Item Number: 61

Addendum StartPage: 0



APPLICATION OF SOUTHWESTERN	§	BEFORE THE STATE OFFICE
ELECTRIC POWER COMPANY FOR	§ §	OF
AUTHORITY TO CHANGE RATES	§ §	ADMINISTRATIVE HEARINGS

SOUTHWESTERN ELECTRIC POWER COMPANY'S RESPONSE TO CITIES ADVOCATING REASONABLE DEREGULATION'S THIRD SET OF REQUESTS FOR INFORMATION

NOVEMBER 18, 2020

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Files provided electronically on the PUC Interchange

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- 2020_3_FERC_BS1__SWP_Corp_Consolidated.xls
- ", 51415 CARD03.pdf
- CARD 3-13 Attachment 1 (AEP_SWEPCO_10K_2017).pdf
- CARD 3-13 Attachment 2 (AEP_SWEPCO_10K_2018).pdf
- CARD 3-13 Attachment 3 (AEP_SWEPCO_10K_2019).pdf
- CARD 3-13 Attachment 4 (AEP_SWEPCO_10Q_Q3_2020).pdf
- CARD 3-13 Attachment 5 (AEP_2017_Balance_Sheet).xlsx
- CARD 3-13 Attachment 6 (AEP_2019_Financials).xlsx
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- CARD 3-13 Attachment 8 (SWEPCo_2017_Balance_Sheet).xlsx
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- (ARD 3-19 Attachment A.xlsx
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- CARD_3_9_Attachment1.xls
- ថ្មីដ្ឋា SWEPCo_-_T-Lock_(09.12.18_Settlement)_Amortization_Schedule_FINAL_(2).xlsm

CARD 3-14 Attachment A (2020 SWEPCO TX RC D'Ascendis ROE Testimony).doc

SWEPCO_03-31-2020_WCOC xlsx

SOAH DOCKET NO. 473-21-0538 PUC DOCKET NO. 51415

SOUTHWESTERN ELECTRIC POWER COMPANY'S RESPONSE TO CITIES ADVOCATING REASONABLE DEREGULATION'S THIRD SET OF REQUESTS FOR INFORMATION

Question No. CARD 3-1:

Please provide copies of all presentations made to rating agencies and/or investment firms by American Electric Power Company and/or Southwestern Electric Power Company between January 1, 2019 and the present.

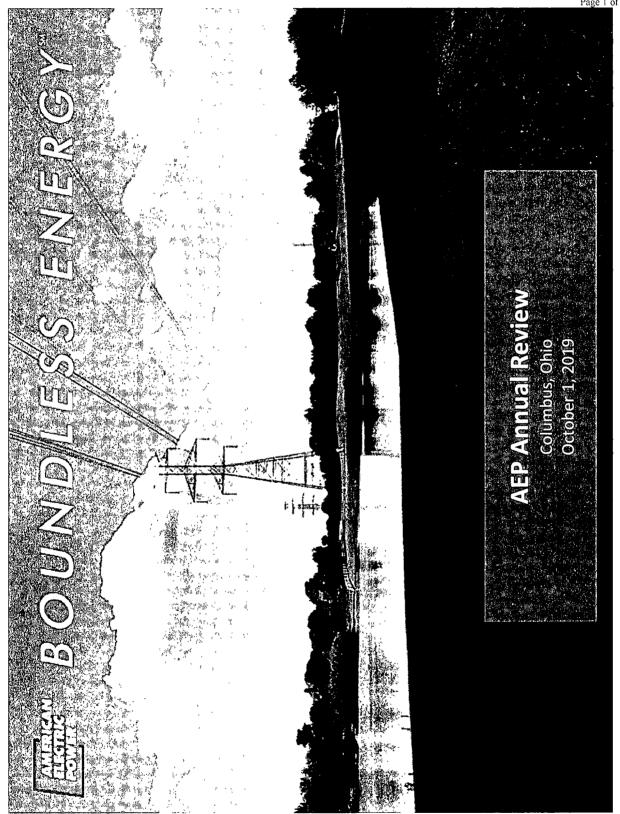
Response No. CARD 3-1:

Presentations for the time period requested all can be found on AEP.com on the following link: https://aep.com/investors/events

Rating agency presentations are attached as CARD_3_1_Attachment 1 and CARD_3_1_Attachement 2.

Prepared By: Darcy L. Reese Title: Mng Dir Investor Relations
Prepared By: Carrie M. Luedtke Title: Corp Finance Analyst Prin

Sponsored By: Renee V. Hawkins Title: Mng Dir Corporate Finance



"Safe Harbor" Statement under the Private Securities Litigation Reform Act of 1995



This presentation contains forward-looking statements within the meaning of Section 21E of the Securities Exchange Act of 1934. Although AEP and each of its Registrant Subsidiaries believe that their expectations are based on reasonable assumptions, any such statements may be influenced by factors that could cause actual outcomes and results to be materially different from those projected. Among the factors that could cause actual results to differ materially from those in the forward-looking statements are: changes in economic conditions, electric market demand and demographic patterns in AEP service territories, inflationary or deflationary interest rate trends, volatility in the financial markets, particularly developments affecting the availability or cost of capital to finance new capital projects and refinance existing debt, the availability and cost of funds to finance working capital and capital needs, particularly during periods when the time lag between incurring costs and recovery is long and the costs are material, decreased demand for electricity, weather conditions, including storms and drought conditions, and the ability to recover significant storm restoration costs, the cost of fuel and its transportation, the creditworthiness and performance of fuel suppliers and transporters and the cost of storing and disposing of used fuel, including coal ash and spent nuclear fuel, the availability of fuel and necessary generation capacity and performance of generation plants, the ability to recover fuel and other energy costs through regulated or competitive electric rates, the ability to build or acquire renewable generation, transmission lines and facilities (including the ability to obtain any necessary regulatory approvals and permits) when needed at acceptable prices and terms and to recover those costs, new legislation, litigation and government regulation, including oversight of nuclear generation, energy commodity trading and new or heightened requirements for reduced emissions of sulfur, nitrogen, mercury, carbon, soot or particulate matter and other substances that could impact the continued operation, cost recovery and/or profitability of generation plants and related assets, evolving public perception of the risks associated with fuels used before, during and after the generation of electricity, including nuclear fuel, timing and resolution of pending and future rate cases, negotiations and other regulatory decisions, including rate or other recovery of new investments in generation, distribution and transmission service and environmental compliance, resolution of litigation, the ability to constrain operation and maintenance costs, prices and demand for power generated and sold at wholesale, changes in technology, particularly with respect to energy storage and new, developing, alternative or distributed sources of generation, the ability to recover through rates any remaining unrecovered investment in generation units that may be retired before the end of their previously projected useful lives, volatility and changes in markets for coal and other energy-related commodities, particularly changes in the price of natural gas, changes in utility regulation and the allocation of costs within regional transmission organizations, including ERCOT, PJM and SPP, changes in the creditworthiness of the counterparties with contractual arrangements, including participants in the energy trading market, actions of rating agencies, including changes in the ratings of debt, the impact of volatility in the capital markets on the value of the investments held by the pension, other postretirement benefit plans, captive insurance entity and nuclear decommissioning trust and the impact of such volatility on future funding requirements, accounting pronouncements periodically issued by accounting standard-setting bodies, and other risks and unforeseen events, including wars, the effects of terrorism (including increased security costs), embargoes, naturally occurring and human-caused fires, cyber security threats and other catastrophic events.

INVESTOR RELATIONS

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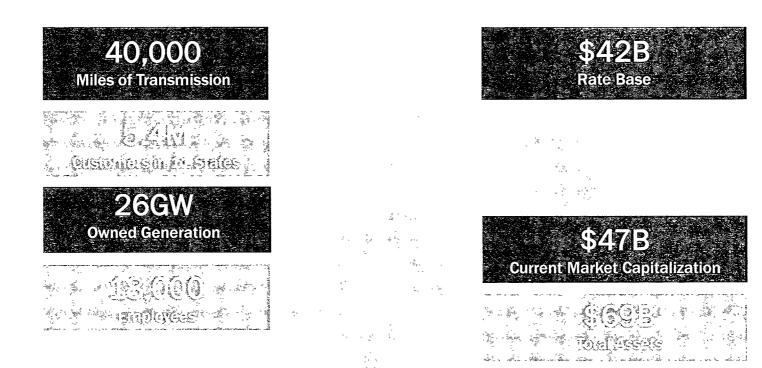
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The Premier Regulated Energy Company

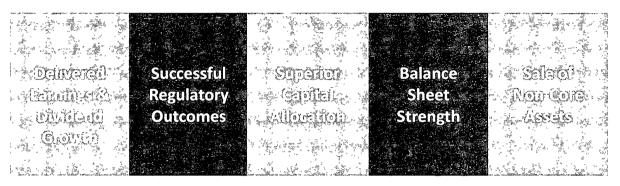




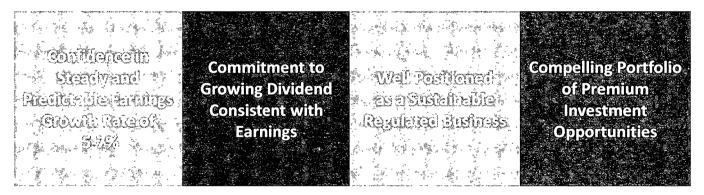
Statistics as of December 31, 2018 except for market capitalization as of September 26, 2019



Strong Execution Track Record



AEP Leading the Way Forward



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Execute Strategy

Improve customer experience

Invest in transmission and distribution networks

Invest in regulated and contracted renewables

Mitigate fossil and nuclear generation risk and optimize operations

*Relentless O&M optimization/Future of work

Initiative Themes

Invest in infrastructure and renewables

Pilot technologies and business models

Mitigate generation exposure

Manage customer bills

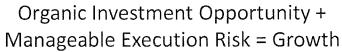
Grow load

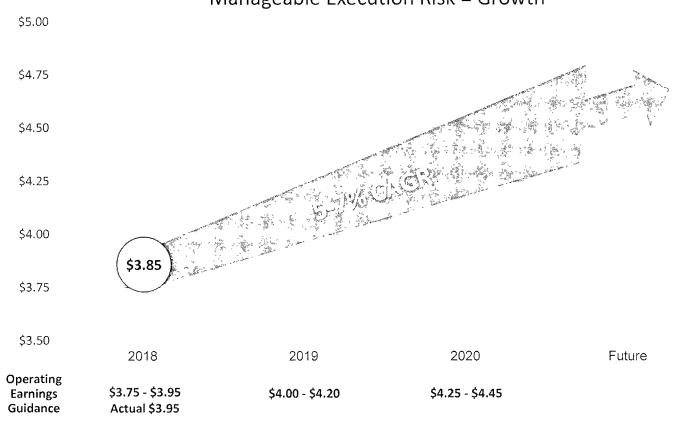
Improve operations

We are focused on executing our strategy while improving the customer experience

Operating Earnings Guidance



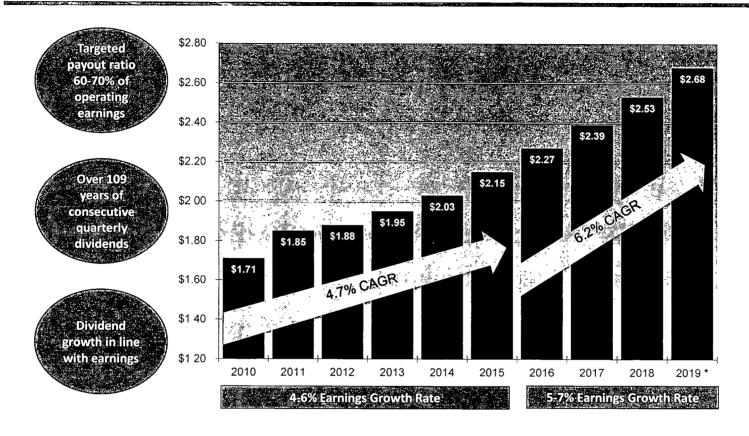




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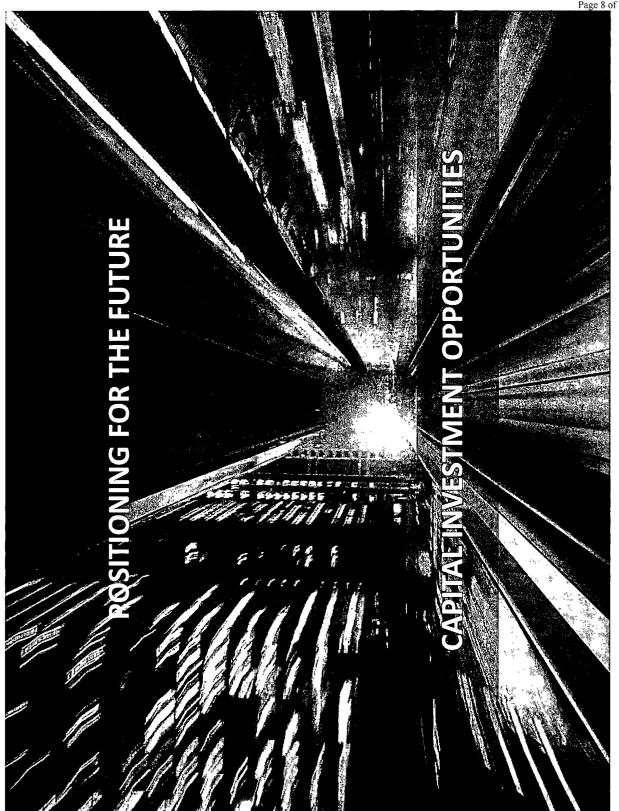
Strong Dividend Growth





EPS Growth + Dividend Yield = 9 to 10% Annual Return Opportunity

* Subject to Board approval



Robust Organic Capital Opportunities

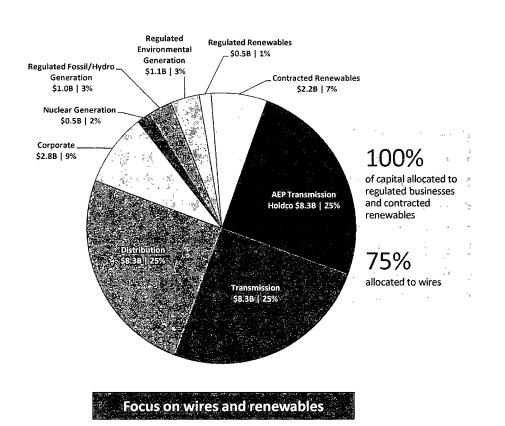


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Situ modernization, aging initiastructure, physical/cyber
Transmission security, reliability, market efficiency and economic
development projects
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Distribution Grid modernization, reliability improvement projects
and distribution station refurbishment
1. 新聞 日本 · · · · · · · · · · · · · · · · · ·
Regulated renewables supported by integrated resource
Renewables plans and contracted renewables
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Technology Digitization, automation, cyber security, enterprise-wide applications
applications
。我们会认为的最近的的,但是不是一个人,我们就是被自己的,我们就是一个人,就是不是一个人,就是不是一个人,我们就是不是一个人,我们就是不是一个人,我们就是不是一个

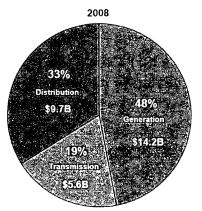
2019-2023 Capital Forecast of \$33B and Net Plant



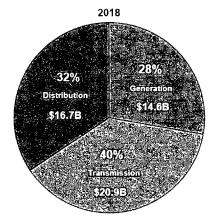
2019-2023 Capital Forecast



Historical Net Plant Profiles



Total \$29.5B



Total \$52.2B

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2019-2023 Capital Forecast by Subsidiary



Sinmiliae (excliption)	200E	थ्राष्ट्रग≡	2021E	यास्याइ	202AI3	Voice
Appalachian Power Company	\$821	\$786	\$847	\$939	\$875	\$4,267
Wheeling Power Company	\$42	\$43	\$52	\$56	\$33	\$226
Kingsport Power Company	\$17	\$15	\$21	\$19	\$25	\$97
Indiana Michigan Power Company	\$647	\$609	\$611	\$519	\$506	\$2,892
Kentucky Power Company	\$220	\$229	\$227	\$228	\$226	\$1,130
Ohio Power Company	\$720	\$554	\$600	\$640	\$694	\$3,208
Public Service Company of Oklahoma	\$339	\$365	\$338	\$487	\$450	\$1,978
Southwestern Electric Power Company	\$421	\$473	\$523	\$587	\$675	\$2,679
AEP Texas Company	\$1,271	\$1,031	\$1,069	\$1,146	\$1,245	\$5,763
AEP Generating Company	\$72	\$40	\$29	\$24	\$10	\$175
AEP Transmission Holdco	\$1,590	\$1,536	\$1,578	\$1,719	\$1,829	\$8,252
Generation and Marketing	\$1,627	\$127	\$183	\$132	\$133	\$2,202
Other	\$10	\$6	\$6	\$6	\$4	\$32
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Capital plans are continuously optimized which may result in redeployment between functions and companies. Table may not foot due to rounding.

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Cash Flows and Financial Metrics



\$ in millions	2019E	2020E		2021E		2022E
Cash from Operations	\$ 4,700	\$ 4,900	\$	5,300	\$	5,800
Capital & JV Equity Contributions *	(7,300)	(5,800)		(6,100)		(6,500)
Other Investing Activities	(300)	(400)		(100)		(100)
Common Dividends **	(1,300)	(1,300)		(1,300)		(1,400)
Excess (Required) Capital	\$ (4,200)	\$ (2,600)	\$	(2,200)	\$	(2,200)
Financing						
Excess (Required) Capital	\$ (4,200)	\$ (2,600)	\$	(2,200)	\$	(2,200)
Debt Maturities (Senior Notes, PCRBs)	(1,100)	(900)		(1,500)		(1,600)
Securitization Amortizations	(300)	(200)		(100)		(100)
Equity Units ***	800	- -		· ·		-
Equity Units Conversion	-	-		-		800
Equity Issuances - Includes DRP/401(k)	100	100		100		500
Debt Capital Market Needs (New)	\$ (4,700)	\$ (3,600)	\$	(3,700)	\$	(2,600)
Financial Metrics						
Debt to Capitalization (GAAP)		<i>></i> -, 55%`- (60%	» *	•	
FFO/Total Debt (Moody's)	r	Mid Te	ens			

^{*} Estimates are based on current capital expenditure program 2019 capital expenditures reflect \$551M purchase price and excludes recently announced contracted renewables transaction minority interest and JV project debt

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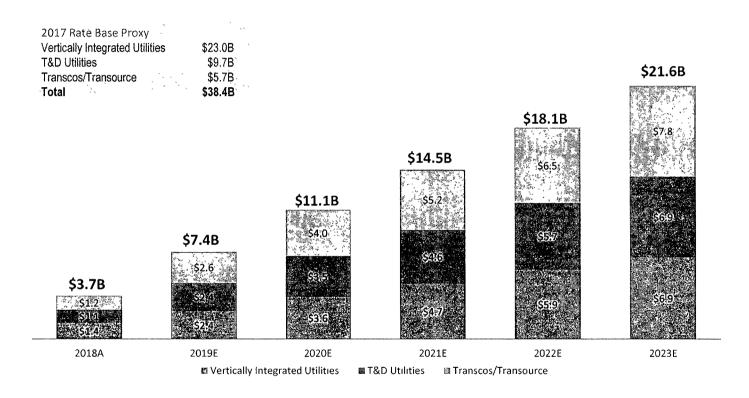
^{**} Common dividends \$2 68/share 2019-2022 Dividends evaluated by Board of Directors each quarter, stated target payout range is 60%-70%.

^{*** \$700}M offering and exercise of over-allotment.

7.8% CAGR in Rate Base Growth



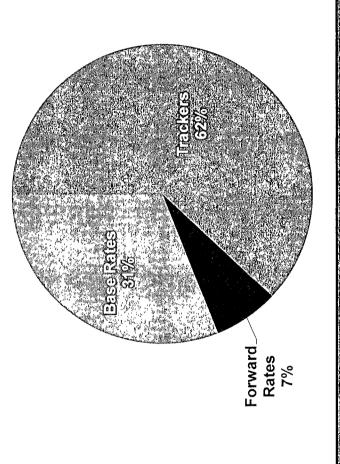
Cumulative Change from 2017 Base



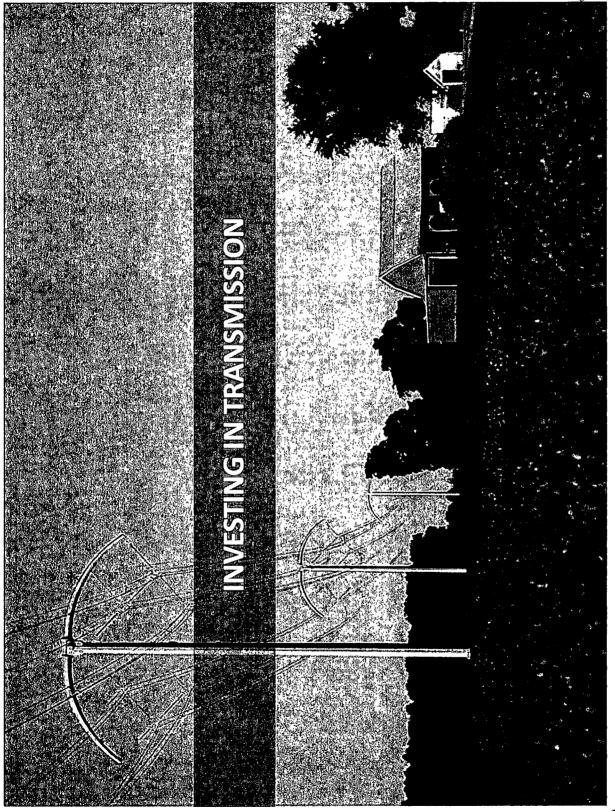
5% - 7% EPS growth is predicated on regulated rate base growth

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Efficient Cost Recovery Mechanisms



2019 – 2023 Capital Plan Recovery Mechanisms by OPCO / ELECTRICAN Public Service Co. of Oklahoma Trackers 7% **AEP Transmission HoldCo** Kentucky Power Ohio Power Indiana Michigan Power **AEP Texas** Foward Rates 75% Southwestern Electric Power Appalachian Power

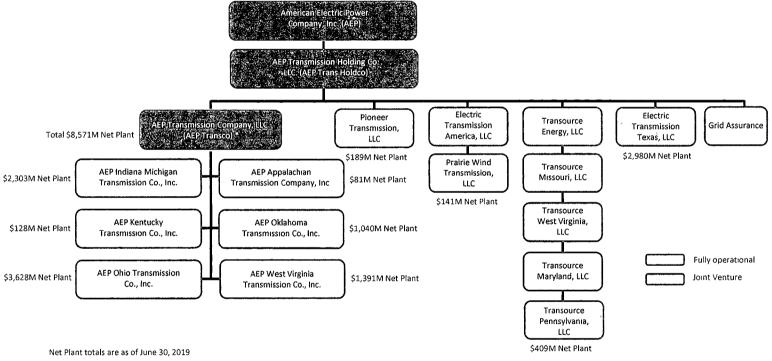


AEP Transmission Holdco Legal Entity Structure



AEP Transmission Company, LLC (AEP Transco) is wholly-owned by AEP Transmission Holding Company, LLC (AEP Trans Holdco)

AEP Trans Holdco is a wholly-owned subsidiary of American Electric Power Company, Inc. (AEP), one of the largest utility holding companies in the U.S.



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^{*} Debt issued at AEP Transco level for transmission companies

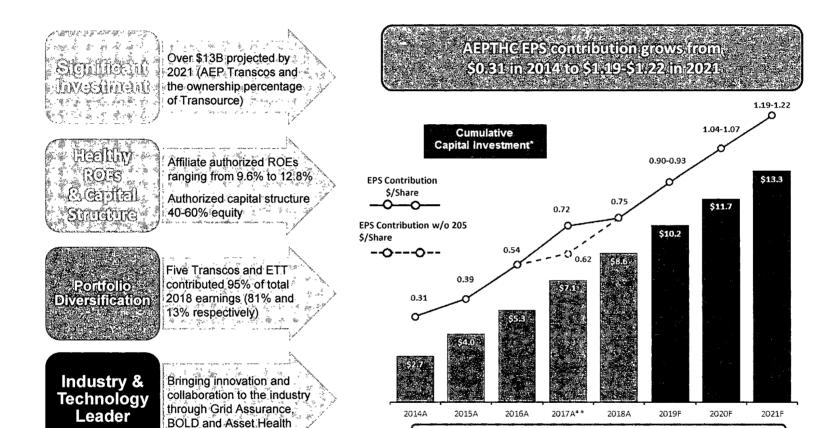


Strategy	Execution	Results
Infrastructure Investment	Targeted Capital Investments Local Reliability, Telecom modernization, Asset Health	Improved Reliability/Resiliency Earnings Growth Efficient Cost Recovery
Customer - Experience	Improve Reliability, SCADA technology, security across the transmission system, Economic Development	Modernize grid reducing equipment failures/outages, community impact, customer relations
Innovative Technologies/Solution	G&T Integrated Solutions Public Power ASSURANCE Solutions	Industry Leadership Customer Solutions
Non-Traditional Growth	PROTECTION Prairie Wind Transmission TRANSMISSION Prairie Wind Transmission Any nature terms white Bergs eath TRANSOURCE ETT Energy Control Transmission Faces	Investment & Customer Diversity

The nation's largest transmission services provider is focused on delivering its \$3 billion annual capital plan to improve customer reliability and grid resiliency while meeting earnings growth targets through diversified investments.

AEPTHC Target Earnings 2018 - 2021





* Capital investment excludes Transource unapproved projects, JV equity contributions, BOLD and Grid Assurance.

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AEPTHC's 2015 - 2021 EPS growth projected at a CAGR of 17.5%

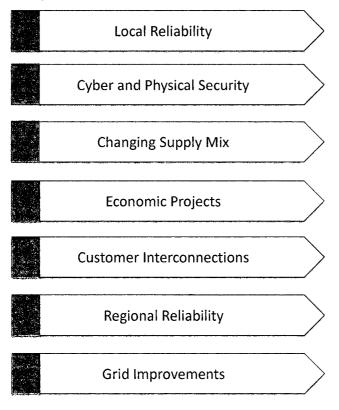
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^{**} In addition to forward looking rates, 2017 includes a historical true up for East Transcos. Having both in one year is a one time occurrence

Transmission Investment Drivers



Key Transmission Investment Drivers



Typical 2018-2023 Project Examples

- Flushing-Smyrna (OH) construct 13 miles to alleviate thermal overload
- Sheridan Project (WV) 10M T outage minutes in last 3 years
- Greenland-VBI North (OK) replace 41 mile, 1938-vintage line
- Roanoke Project (VA) replace aging circuit breakers at 4 stations
- Install physical security at critical Ohio EHV stations \$220M
- Install physical security at critical ERCOT stations \$40M
- · Telecom Modernization fiber expansion for increased security
- Alamo (TX) connect 114MW solar farm
- Cactus Flats (TX) connect 150MW wind farm
- Transource IEC Project (PA/MD) reduce congestion costs by \$620M over 15 years
- Oklahoma serve ~80MW increased load at gas plant
- Columbus, OH serve new data centers
- Lotebush (TX) new station for Permian Basin load growth
- La Palma Station (TX) regional reliability to support peak demand
- Thorofare Project (WV-Transource) regional reliability
- Jackson's Ferry 765kV SVC (VA) high voltage during light load
- Brackettville-Escondido (TX) improve reliability in Eagle Pass
- SCADA Expansion (APCo) \$10M SCADA in remote stations
- Kenzie Creek (MI) replace switches with breakers
- Telecom Modernization Program extend to additional stations
- AEP's 15 state asset base serves as the foundation of the nation's electric system. FERC's support of transmission investments recognizes the critical function transmission plays in the power delivery system.

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Transmission Investment Categories

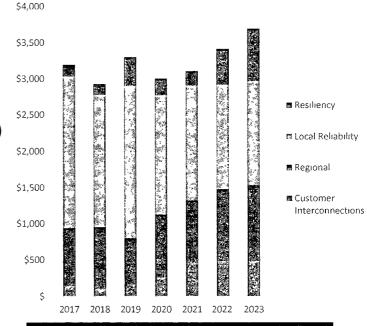


As the foundation of the power system, transmission integrates generation and loads across large regional footprints.

- Growing complexity of the integrated power grid: distributed generation, diversity in generation fleet, location and variability of generation
- System operations: Systems operating close to feasibility limits are more vulnerable (failures/intelligent adversaries)
- <u>Survivability</u>: Systems ability to survive contingencies without customer interruption

Major Issues Being Addressed

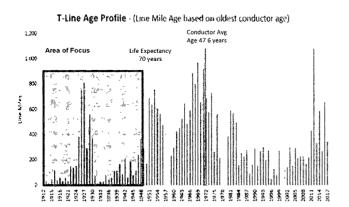
- Aging transmission facilities in poor condition
- Reduction of radial transmission sources
- NERC/RTO requirements
- Decrease customer exposure to Transmission outages
- Improve response time
- Enhance operability of the system

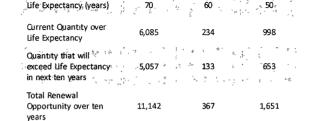


2017-2023 Investment = \$22.6 Billion

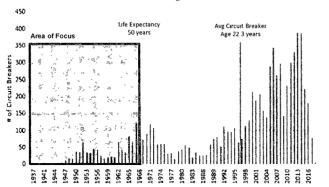
Robust Transmission Capital Expenditure Opportunities









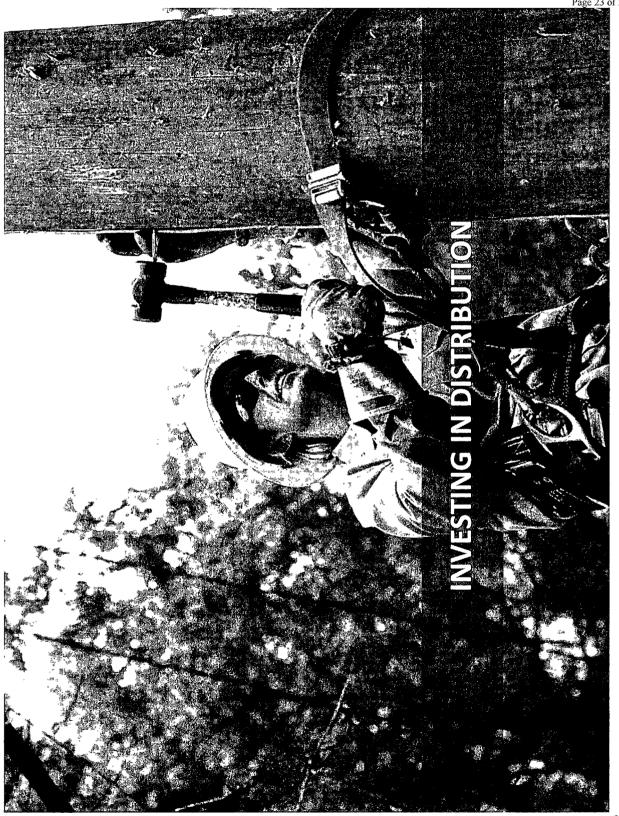


\$2.3 billion of annual investment, and addresses the facilities past their estimated life expectancy; the asset age profile changes with actual investment.

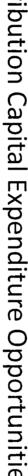
Scope and scale of AEP's Transmission network results in sustainable investment opportunity without risk of over-investment

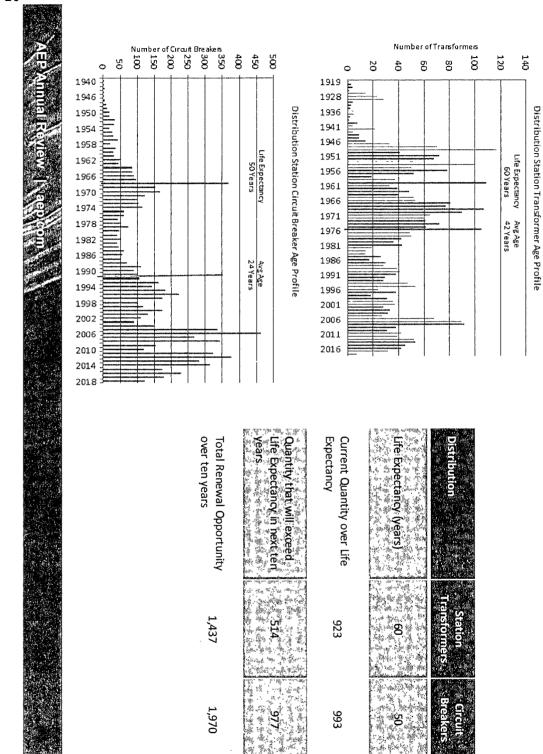
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Robust Distribution Capital Expenditure Opportunities





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Examples of Incremental Distribution Investment Opportunities

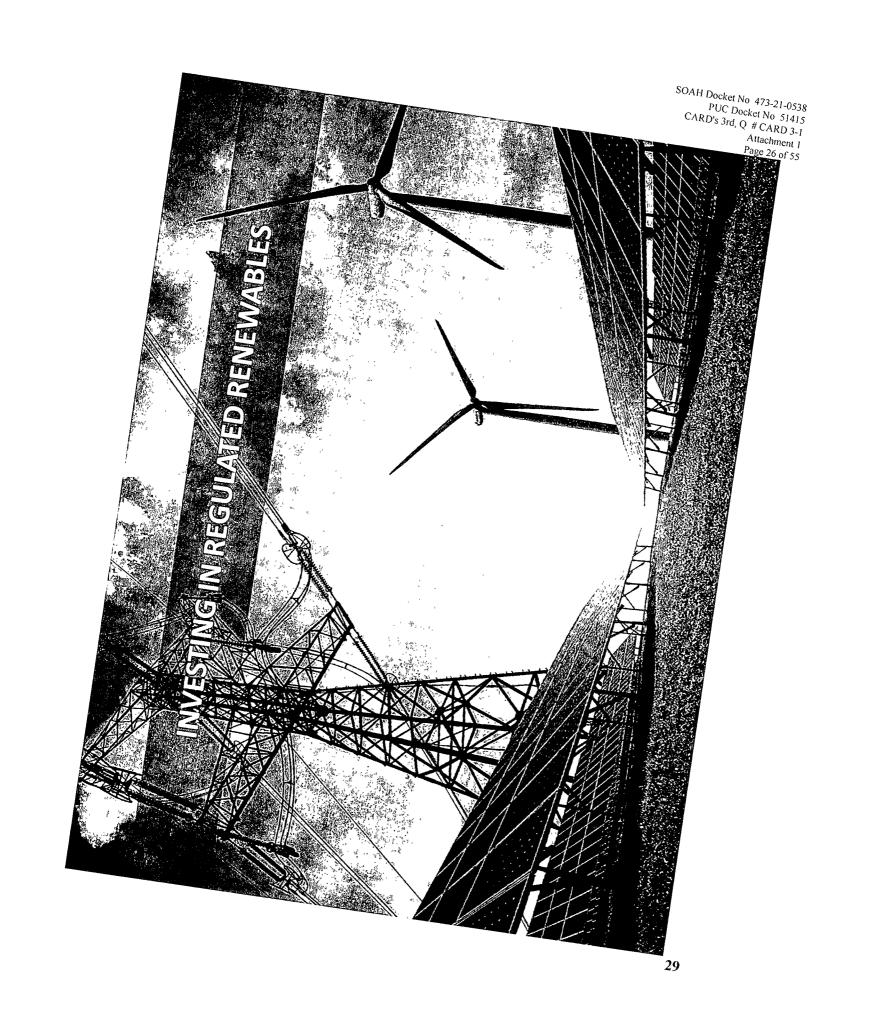


- Grid Modernization
 - Distribution SupervisoryControl and Data Acquisition
 - Smart Circuits
- Distribution Line Re-Conductoring
 - Replace deteriorated small wire
 - Increase capacity to facilitate ties for smart circuits
 - Over 86,000 miles of small wire is in service across the operating companies (age profile at least 40 years)

- Pole Replacement Programs
- Obsolete Station Breaker Replacements
- Capacity/Reliability Projects
- Distribution Station Transformers

Represents ~ \$500M/year of incremental investment opportunity to improve system reliability and modernize the system

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North Central Wind Overview





Jurisdiction (Docket #)	MW	% of Project
PSO (PUD 2019-00048)	675	45.5%
SWEPCO - AR (19-035-U)	155	10.4%
SWEPCO - LA (U-35324)	268	18.1%
SWEPCO - TX (49737)	309	20.8%
SWEPCO - FERC	78	5.2%
Tota	al: 1,485	100%
7/15/19 Q3 2019 – Q3 2020 Filings in AR, LA, OK & TX	Dec 2020 Sundance completion & purchase	Dec 2021 Traverse & Maverick completion & purchase
a 2019	■ 2020	日 2021

SWEPCO and PSO Regulated Wind Investment Opportunity							
Total Rate Base Investment	~\$2 billion (1,485 MW)						
	<u>Name</u>	MW	Investment	In-Service			
North Central Wind	Sundance	199	\$307M	EOY 2020 (100% PTC)			
	Traverse	999	\$1,287M	EOY 2021			
	Maverick	287	\$402M	(80% PTC)			
Net Capacity Factor	44.0%						
Customer Savings	~\$3 billion (30-year nominal \$)						
Developer	Invenergy						
Turbine Supplier	GE GE						

- Regulated rate base wind investment opportunity with ability to meaningfully reduce customer rates
 - Acquiring facilities on a fixed cost, turn-key basis at completion
 - Contingent upon satisfactory regulatory approvals
- Investment not included in the Company's current capital expenditure plan
- Acquisition can be scaled, subject to commercial limitations, to align with individual state resource needs and approvals

North Central Wind – Procedural Schedules



			Rebuttal Testimony		Hearing
PSO (PUD 2019-00048) ¹	November 1, 2019	November 1, 2019	November 22, 2019	December 12, 2019	January 13, 2020
SWEPCO – AR (19-035-U) ²	December 13, 2019	December 13, 2019	January 17, 2020	N/A	March 10, 2020
SWEPCO LA (U-35324)	February 7, 2020	February 7, 2020	March 9, 2020	**************************************	March 25, 2020
SWEPCO – TX (49737) ³	January 14, 2020	January 22, 2020	February 12, 2020	N/A	February 24, 2020

¹ Oklahoma has a 240-day statutory timeline for issuing an order, making the requested approval date March 11, 2020

² Proposed schedule

 $^{^3}$ Texas has a 365-day statutory timeline for issuing an order, making the requested approval date July 15, 2020 (366 days, 2020 is a leap year)

AEP Ohio – Solar Project Filing



- ☐ Two solar REPAs with both facilities on line by end of 2021:
 - > Highland Solar, 300 MW
 - Willowbrook Solar, 100 MW
- □ Debt Equivalency Cost Mechanism to provide recovery for use of Balance Sheet (approximately \$6M annually)
- Green Tariff that allows all customer classes the opportunity to purchase RECs to cover some or all of their generation supply
- ☐ Analysis resulted in nominal savings of over \$200M over the life of the projects when considering base band pricing



6 Ohio Power Service Territory

Projected Resource Additions

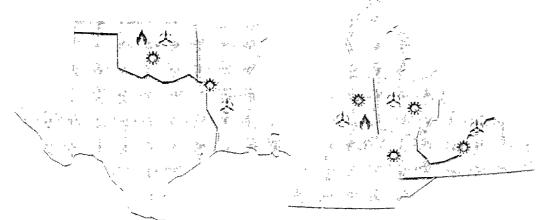


	Solar, Addit io	ns (MW)			Wind Additio	ns:(MW) 🤰	3-
Operating Co:	2020- 2022	2023- 2027	2028- 2030	Operating Co:	2020- 2022	2023- 2027	2028- 2030
AEP Ohio	400 *	-	-	AEP Ohio	500 *	-	-
APCo	15	300	750	APCo	-	300	
1&M	150	600	550	1&M	300	150	300
KPCo	20 *	30	40	KPCo	-	-	-
PSO	11	600	600	PSO	675 *	400	200
SWEPCO	-	-	300	SWEPCO~	810 *	600	-
Totals	596	1,530	2,240	Totals	2,285	1,450	500

i N	itural Gas Add	itions (MW)⊼	()
Operating Co:	2020- 2022	2023 2027	2028- 2030
I&M	18	18	788
PSO	, 373 ⁽¹⁾	410 (1)	
Totals	391	428	788

⁽¹⁾ To replace expiring PPA

*	Subject to	regulatory	filings	currently	underway
---	------------	------------	---------	-----------	----------



Total Project Additio	ted Resource
Resource	2020-2030
Solar	4,366
Wind .	4,235
Natural Gas	1,607
Totals	10,208

Updated 08/01/2019

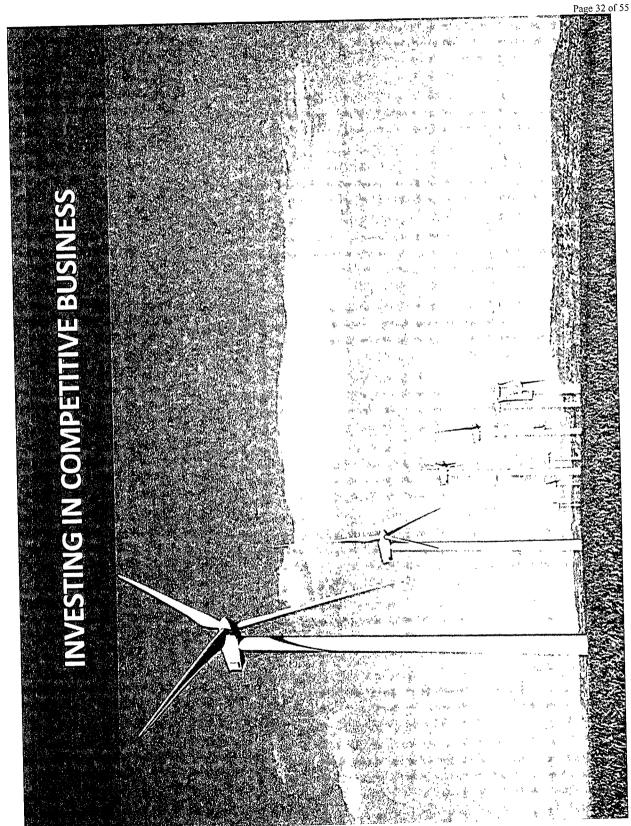
Integrated Resource Plan Status

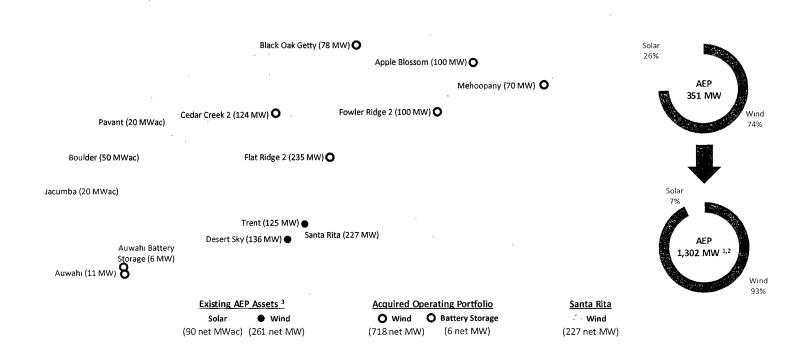


IRPs Underway/Planned									
Previously Approved IRPs	Q4-18	Q1-19	Q2-19	Q3-19	Q4-19				
AEP OHIO ANAIP CAMPANY YOUNG! YSS ENERGY	SOUTHWESTERN ELECTRIC POWER COMPANY A APP SOUTH THE POWER 12/14/18 (AR)		APPALACHIAN POWER AN AEP COUNTY COUNTY STATE OF THE STAT	SOUTHWESTERN ELECTRIC POWER COMPANY	KENTUCKY POWER				
KENTUCKY POWER AN AIP CA. Spery B. UNDLESS EN. 863	PUBLIC SERVICE COMPANY OF OKLAHOMA 12/21/18		July / Aug 2019	8/15/19 (LA)	12/20/19				

Next IRP filing date for APCo (WV) is January 2021

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Projects complement AEP's existing footprint of large scale renewable projects in the contracted renewable space: Texas (488 MW, wind)¹, California (20 MW, solar), Nevada (50 MW, solar) and Utah (20 MW, solar)

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¹ Includes recent purchase of 75% interest in 302 MW Santa Rita East Wind Project currently under construction in west of San Angelo, Texas | ² Includes 6 MW of Auwahi battery storage | ³ Excludes AEP OnSite Partners Note MWs in map reflect net capacity

Overview of Recently Announced Contracted Renewables Transaction



Transaction Overview

Operating Portfolio

- 724 net MW operating wind portfolio across seven states (CO, HI, IN, KS, MI, MN, PA) 1
 - Five of seven wind assets owned 50 / 50 with BP Wind Energy
- Long-term PPAs with A/A2-rated ² counterparties & 16 years remaining life ³
 - 21% of PPAs with AEP Ohio, SWEPCO, and Indiana Michigan Power

ransaction Value

- \$1.05B enterprise value including assumption of \$470M of existing project debt & tax equity
- Approvals & Timing
- Closed in April 2019 with approvals from the FERC and Hart-Scott-Rodino clearance

Strategic Rationale and Investment Highlights

Expands Contracted Renewables Footprint

- Enhances renewable platform scale and diversity, increasing industry participation in a market we expect to continue to grow
 - The acquisition, in addition to Santa Rita East Wind, increases AEP's contracted large scale renewable generation portfolio by 951 MW 4 to 1,302MW
 - Accelerates and de-risks \$2.2B planned renewable investment commitment through 2023
- Assets are located in known markets where we already have generation assets or utility operations

Strong Financial Fit

- Transaction expected to be immediately accretive to EPS in first full year by a few cents
 - Further solidifies our long-term EPS growth guidance of 5% 7%
- Tax efficient transaction as our tax appetite allows for monetization of transaction tax attributes, including production tax credits
- Development pipeline of the portfolio of up to 1 GW provides potential for incremental growth opportunities

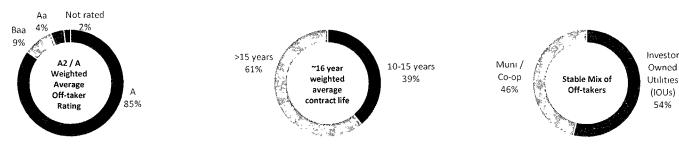
SOAH Docket No 473-21-0538 PUC Docket No 51415 CARD's 3rd, Q # CARD 3-1

¹⁷²⁴ net MW includes 6 MW battery storage at the Auwahi project | 2 Credit ratings as of 10/8/2018 Maui Electric Company is not rated by Moody's and is rated BBB- by S&P. As such, Maui is shown in the Baa3 category in the pie chart on slide 32 (corresponding Moody's category) for illustrative purposes | 3 Weighted average remaining contract life and asset age as of 12/31/2018 | 4 Includes recent purchase of 75% interest in 302 MW Santa Rita East Wind Project currently under construction in west of San Angelo, Texas

Details of Recently Announced Contracted Renewables Transaction



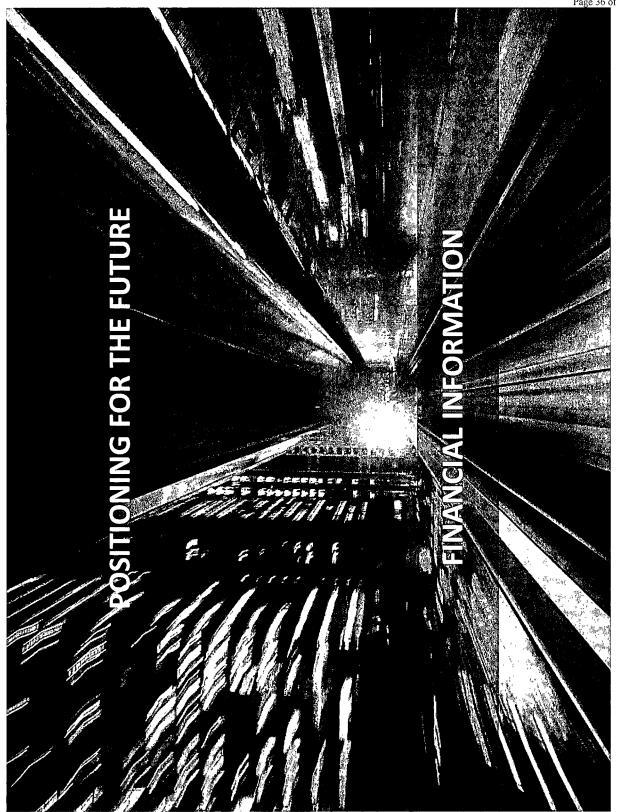
Asset	MW Net ¹	Off-taker	COD	PPA Expire	Turbine	O&M
Fowler Ridge 2 (IN)	100	ASP VECTREN MORNA MICHIGAN MOVIE	2009	2029	%	Vestas
Cedar Creek 2 (CO)	124	Xcel Energy	2011	2035	E STHOROEX	Vestas .
Flat Ridge 2 (KS)	235	geci 🔯 🔊 ====	2012	2036	- 88	(3)
Mehoopany (PA)	70	ÖDEC SAMBCO	2012	2032	8	3
Auwahi (Hi)	11	Maui Electric	2012	2032	SIEMENS	SIEMENS
Total	540					
Black Oak Getty (MN)	78	MMPA	2016	2036	Vestas	Vestas
Apple Blossom (MI)	100	Consumers Everyy	2017	2033	Vestas	Vestas
Total	178	<u> </u>				
Overall Total	718-2			16 yrs ³		



 1 Reflects AEP's share \mid 2 Excludes 6 MW of Auwahi battery storage \mid 3 Based on weighted average contract life

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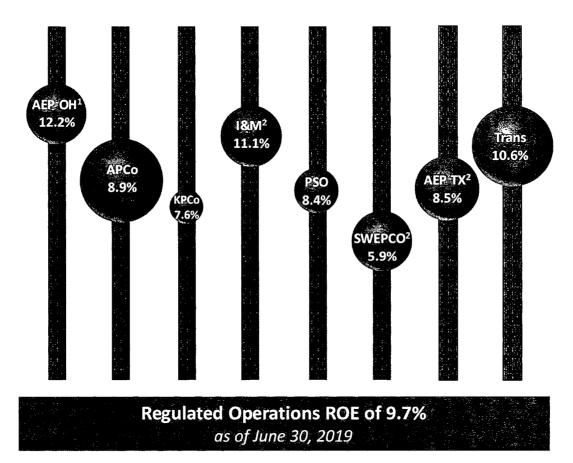
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Regulated Returns

Twelve Months Ended 6/30/2019 Earned ROE's (non-GAAP operating earnings, not weather normalized)





 $^{\rm 1}$ Adjusted to reflect ROE after roll-off of legacy items | $^{\rm 2}$ Current base rate cases

Sphere size based on each company's relative equity balance

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Current Rate Case Activity



AEP Texas

Docket #: 49494 05/01/2019 Filing Date: Requested Rate Base: \$5.0B Requested ROE: 10.5% 55%D / 45%E Cap Structure:

Revenue Increase: \$35M Test Year: 12/31/2018

Procedural Schedule:

08/20/2019 Hearing Expected Effective Date First quarter 2020



I&M - Indiana

45235 Docket #: Filing Date: 05/14/2019 Requested Rate Base: \$4.9B Requested ROE: 10.5%

Cap Structure: 53.2%D / 46.8%E

Gross Revenue Increase: \$172M

(Less \$78M D&A)

\$94M Net Revenue Increase:

2020 Forecasted Test Year:

Procedural Schedule:

08/20/2019 Intervenor Testimony Rebuttal Testimony 09/17/2019 10/07/2019 Hearing Expected Effective Date March 2020



Current Rate Case Activity (continued)



I&M - Michigan

Docket #: U-20359
Filing Date: 06/24/2019
Requested Rate Base: \$1.2B
Requested ROE: 10.5%

Cap Structure: 53.6%D / 46.4%E

Gross Revenue Increase: \$58M

(Less \$6M D&A)

Net Revenue Increase: \$52M

Test Year: 2020 Forecasted

Procedural Schedule:

Staff and Intervenor Testimony 10/17/2019
Rebuttal Testimony 11/12/2019
Hearing 11/21/2019
Expected Commission Order 04/24/2020



SWEPCO - Arkansas¹

Docket #: 19-008-U
Filing Date: 02/28/2019
Requested Rate Base: \$1.2B
Requested ROE: 10.5%

Cap Structure: 49.5%D / 50.5%E

Gross Revenue Increase: \$46M²

(Less \$12M D&A)

Net Revenue Increase: \$34M Test Year: \$21/2018

Procedural Schedule:

Rebuttal Testimony 08/20/2019 Hearing 10/21/2019 Expected Effective Date January 2020

¹ This filing provides SWEPCO's notice of election to move to an annual formula rate review mechanism

² Does not include \$29M of current riders moving to base or \$12M for the requested Distribution Reliability Rider

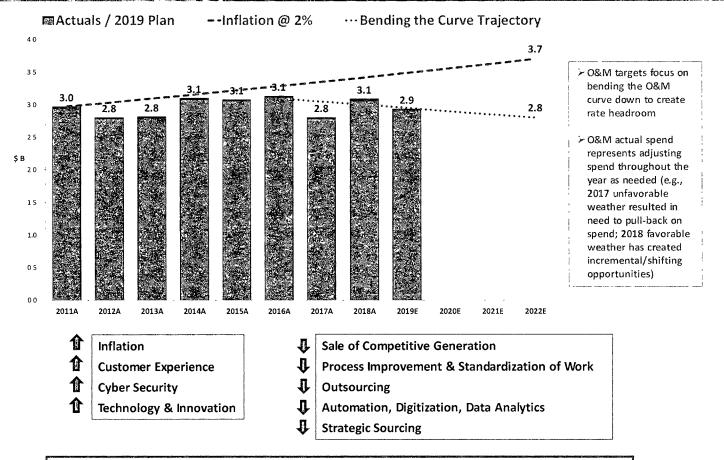


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Bending the O&M Curve While Achieving Our Strategic Goals

AMERICAN ELECTRIC POWER



Our initiatives will help reduce the cost of the current ~4,000+ employees retiring or leaving over the next 5 years, thereby reducing O&M and allowing us to focus on more value added activities for our customers

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Bending the O&M Curve (Initiatives)



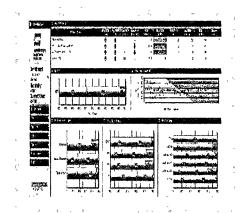
AEP Transmission Spacer Replacement Capital Program

- - The replacement program avoids approximately \$80M in O&M expenditures over time
 - ~150k spacers that are near or at end of life will be replaced as part of a capital program on nearly 1800 miles of 765kV lines over the next 10 years

AEP Station Check In/Check Out Application



- The first true mobile application of its kind saves valuable time for field technicians and dispatchers by eliminating nearly 90% of calls into the TDC from field staff entering or exiting secure facilities
- On average since implementation ~\$500K in labor savings on this activity have been realized



AEP Asset Health Centers

- ❖ Analytical software platform and fleet-wide asset monitoring device that provides instantaneous data through a robust communications infrastructure
- Real-time data helps in making data-driven operating decisions. Improves safety, reduces unplanned equipment outages, helps in planning and optimizing maintenance, and prioritizes renewal decisions about the condition of assets
- In use since 2014, AHC has provided performance data on equipment that has allowed Transmission to avoid \$36M and Generation over \$25M in costs related to equipment failure

Bending the O&M Curve (Initiatives)



Charge Initiative

~\$200M in digital and process-enabled savings over fve years through O&M reductions/cost avoidance (50%), Capital Reduction/Efficiency (25%), Revenues (10%) & Operational Efficiency (15%)

Distribution/Transmission Field Time Reporting App – Mobile app/web that enables contractors to enter time digitally rather than through paper timesheets. Improves efficiency and reduces rework (e.g., audits and audit outcomes).
Contract Digitization – Digital tools & associated analytics that reduce administrative, repetitive work performed by the contract support function.
Digitized Inspections – Combined use of drones, sensors, and digital user tools to minimize the physical labor associated with distribution, transmission, and generation inspections.
Transmission Capital Commissioning Checklist – Mobile app/web that enables employees and contractors to perform and complete commissioning tasks using handheld technology rather than through a paper process. Improves accuracy, increases operational efficiency, reduces rework, and accelerates time to place projects in service.

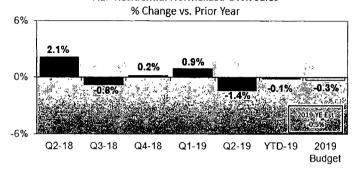
Other Initiatives

- Strategic Work and Workforce Planning
- **Outsourcing Activities**
- Tactical Sourcing through Procurement Management

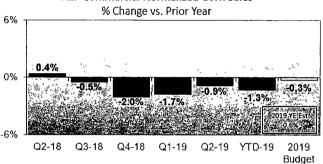
Normalized Load Trends



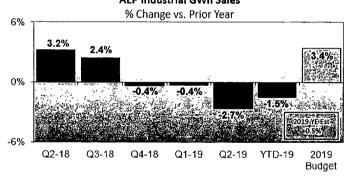
AEP Residential Normalized GWh Sales



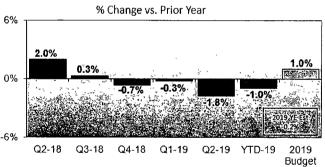
AEP Commercial Normalized GWh Sales



AEP Industrial GWh Sales



AEP Total Normalized GWh Sales

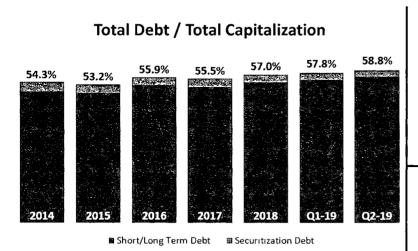


Load figures are provided on a billed basis. Charts reflect connected load and exclude firm wholesale load.

Historical and 2019 data adjusted to reflect reclass of industrial and commercial industry codes for certain customers; no revenue or earnings impact.

Capitalization and Liquidity





Credit Statistics

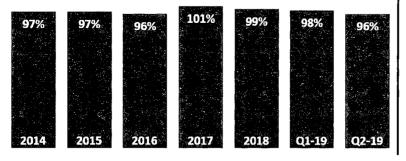


Represents the trailing 12 months as of 6/30/2019

Liquidity Summary

(unaudited):	6/30/2019	Actual
\$ in millions	Amount	Maturity
Revolving Credit Facility	\$4,000	Jun-22
Plus		•
Cash and Cash Equivalents	211	
Less	_ %) B	
Commercial Paper Outstanding	(1,585)	
Letters of Credit Issued	-	
Net Available Liquidity	\$2,626	(, .

Qualified Pension Funding



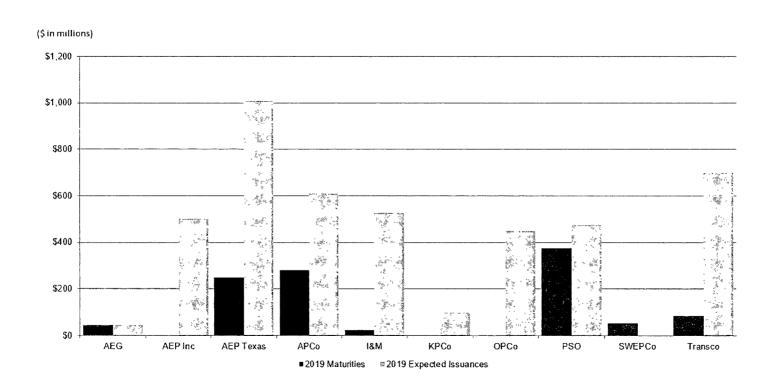
Strong balance sheet, credit metrics and liquidity

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2019 Debt Issuance and Maturities Overview





Financing plans are subject to change depending on capital expenditures, regulatory outcomes, internal cash generation, market conditions and other factors

Long-Term Debt Maturity Profile



(\$ in millions)						
Year	2019	2020	2021	2022	2023	2024
AEP. Inc.	\$0.0	\$500.0	\$400.0	\$1,105.0	\$0.0	\$0.0
AEP Generating Company	\$45.0	\$150.0	\$0.0	\$0.0	\$0.0	\$0 0
AEP Texas*	\$0.0	\$110.6	\$0.0	\$625.0	\$125.0	\$0.0
AEP Transmission Company	\$85.0	\$0.0	\$50.0	\$104.0	\$60.0	\$95.0
Appalachian Power*	\$0.0	\$65.4	\$367.5	\$329.4	\$0.0	\$86.0
Indiana Michigan Power	\$26.8	\$3.9	\$308.5	\$6 6.3	\$312.7	\$0.0
Kentucky Power	\$0.0	\$65.0	\$40.0	\$75.0	\$0.0	\$65.0
Ohio Power*	\$0.0	\$0.0	\$500.0	\$0.0	\$0.0	\$0.0
Public Service of Oklahoma	\$125.0	\$12.7	\$250.0	\$0.0	\$0.0	\$0.0
Southwestern Electric Power	\$0.0	\$115.0	\$0.0	\$275.0	\$0.0	\$25.0
Wheeling Power Company	\$0.0	\$0.0	\$0.0	\$178.0	\$0.0	\$0.0
Total	\$282	\$1,023	\$1,916	\$2,758	\$498	\$271

^{*} Excludes securitization bonds

Includes mandatory tenders (put bonds) Data as of June 30, 2019

AEP Credit Ratings



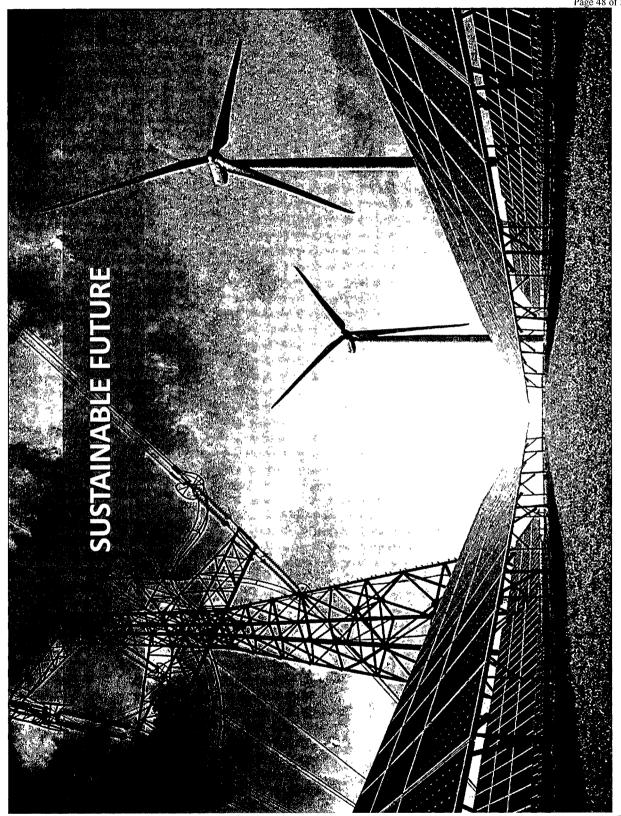
	Mood	ly's	S&P		
Company	Senior Unsecured	Outlook	Senior Unsecured	Outlook	
American Electric Power Company Inc.	Baa1	S	BBB+	S	
AEP, Inc. Short Term Rating	P2	S	A2	S	
AEP Texas Inc.	Baa1	S	A-	S	
AEP Transmission Company, LLC ¹	A2	S	A-	S	
Appalachian Power Company ²	Baa1	S	Α-	S	
Indiana Michigan Power Company ²	A3	S	Α-	S	
Kentucky Power Company	Baa3	S	A-	S	
Ohio Power Company	A2	S	Α-	S	
Public Service Company of Oklahoma	A3	S	A-	\$	
Southwestern Electric Power Company	Baa2	S	Α-	S	
Transource Energy ³	A2	S	NR	NR	

¹ AEP Transmission Co. received a senior unsecured debt rating of A- from Fitch. The rating outlook is Stable.

Ratings current as of June 30, 2019

² In conjunction with the unenhanced VRDN remarketings, APCo and I&M both received short term credit ratings of A-2/P2 from S&P and Moody's, respectively.

 $^{^{\}rm 3}$ NR stands for Not Rated.



Emission Reduction Goals



AEP's Carbon Emission Reduction Goals

70% by 2030 80% by 2050

(both from a 2000 baseline)

Strategy to Achieve:

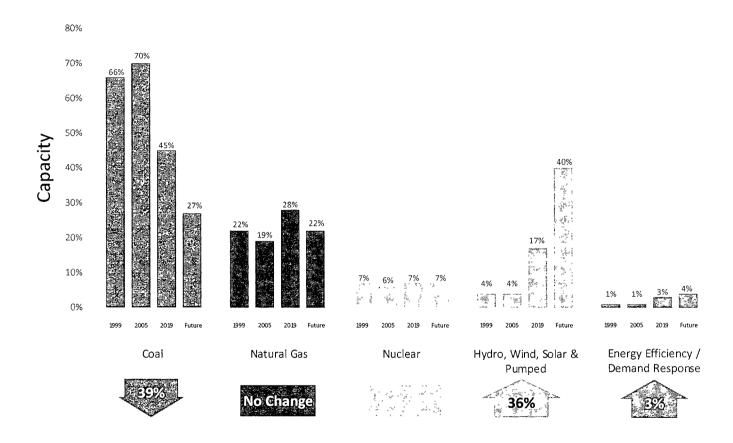
- ☐ Investments in renewable energy within and outside of our traditional service territory
- ☐ Technology deployment (e.g., energy storage)
- ☐ Modernization of the grid with significant investments in transmission & distribution
- ☐ Increased use of natural gas
- ☐ Optimization of our existing generating fleet

Environmental, Social & Governance (ESG) Reporting

- ALP's Corporate Accountability
 Report
- > Clean Energy Strategy: ₃
- American Electric Powers
- Strategic Vision for a Glean Energy Future
- > FEFESG Sustainability
 Reporting AFP's 2019 FF1 ESG
 Report
- > AEP's CDP Survey Responses
- > AEP S GRI Report
- AIP also responds to investor related surveys including MSCI and Susializations

Transforming Our Generation Fleet





As of 08/01/2019 Future includes IRP forecasted additions and retirements through 2030 Energy Efficiency / Demand Response represents avoided capacity rather than physical assets.

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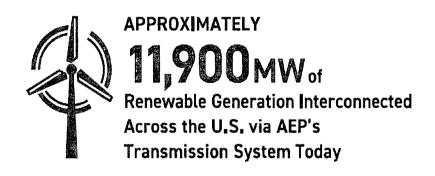
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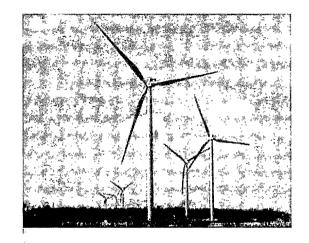
Delivering Clean Energy Resources

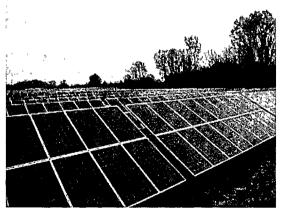


AEP's August 1, 2019 Renewable Portfolio, in MW

Hydro, Wind, Solar & Pumped Storage	Owned MW	PPA MW	Total MW
AEP Ohio		209	209
Appalachian Power Company	785	575	1,360
Indiana Michigan Power Company	36	450	486
Public Service Company of Oklahoma		1,137	1,137
Southwestern Electric Power Company		469	469
Competitive Wind, Solar & Hydro	1,437	175	1,612
Total	2,258	3,015	5,273







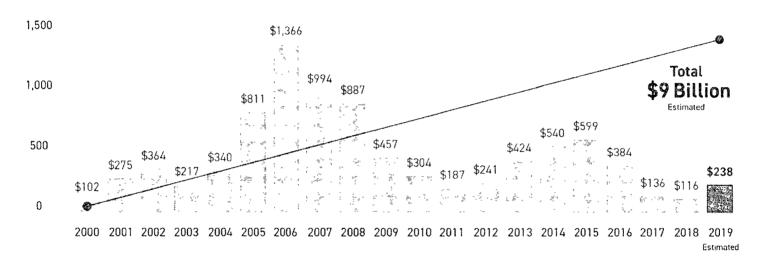
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Largest Investment in Environmental Controls



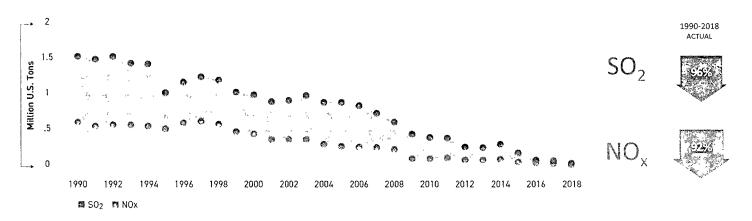
INVESTMENT IN ENVIRONMENTAL CONTROLS \$ in millions



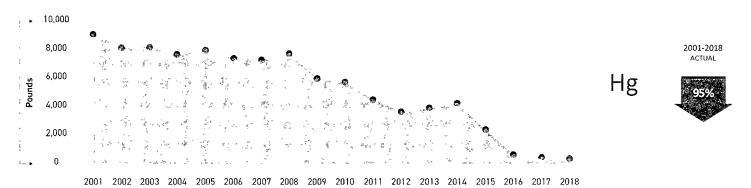
Dramatic Reductions in Emissions



TOTAL AEP SYSTEM NOX & SO2 EMISSIONS



TOTAL AEP SYSTEM MERCURY EMISSIONS

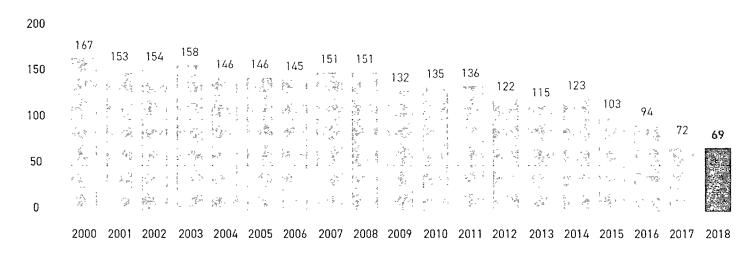


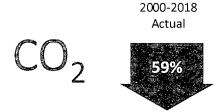
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Dramatic Reductions in Emissions



TOTAL AEP SYSTEM - ANNUAL CO2 EMISSIONS in million metric tons





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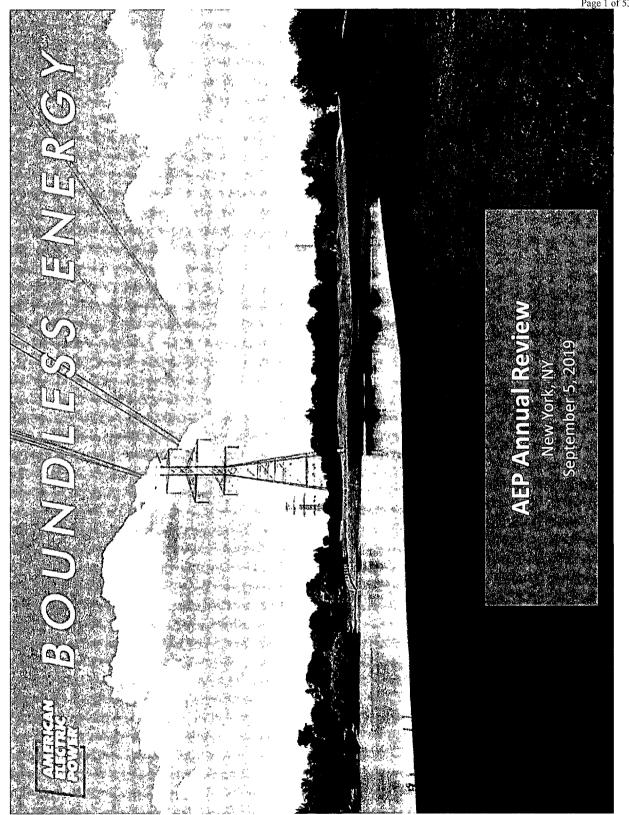


MORE certainty



Adjusted Returns





4		

"Safe Harbor" Statement under the Private Securities Litigation Reform Act of 1995



This presentation contains forward-looking statements within the meaning of Section 21E of the Securities Exchange Act of 1934. Although AEP and each of its Registrant Subsidiaries believe that their expectations are based on reasonable assumptions, any such statements may be influenced by factors that could cause actual outcomes and results to be materially different from those projected. Among the factors that could cause actual results to differ materially from those in the forward-looking statements are: changes in economic conditions, electric market demand and demographic patterns in AEP service territories, inflationary or deflationary interest rate trends, volatility in the financial markets, particularly developments affecting the availability or cost of capital to finance new capital projects and refinance existing debt, the availability and cost of funds to finance working capital and capital needs, particularly during periods when the time lag between incurring costs and recovery is long and the costs are material, decreased demand for electricity, weather conditions, including storms and drought conditions, and the ability to recover significant storm restoration costs, the cost of fuel and its transportation, the creditworthiness and performance of fuel suppliers and transporters and the cost of storing and disposing of used fuel, including coal ash and spent nuclear fuel, the availability of fuel and necessary generation capacity and performance of generation plants, the ability to recover fuel and other energy costs through regulated or competitive electric rates, the ability to build or acquire renewable generation, transmission lines and facilities (including the ability to obtain any necessary regulatory approvals and permits) when needed at acceptable prices and terms and to recover those costs, new legislation, litigation and government regulation, including oversight of nuclear generation, energy commodity trading and new or heightened requirements for reduced emissions of sulfur, nitrogen, mercury, carbon, soot or particulate matter and other substances that could impact the continued operation, cost recovery and/or profitability of generation plants and related assets, evolving public perception of the risks associated with fuels used before, during and after the generation of electricity, including nuclear fuel, timing and resolution of pending and future rate cases, negotiations and other regulatory decisions, including rate or other recovery of new investments in generation, distribution and transmission service and environmental compliance, resolution of litigation, the ability to constrain operation and maintenance costs, prices and demand for power generated and sold at wholesale, changes in technology, particularly with respect to energy storage and new, developing, alternative or distributed sources of generation, the ability to recover through rates any remaining unrecovered investment in generation units that may be retired before the end of their previously projected useful lives, volatility and changes in markets for coal and other energy-related commodities, particularly changes in the price of natural gas, changes in utility regulation and the allocation of costs within regional transmission organizations, including ERCOT, PJM and SPP, changes in the creditworthiness of the counterparties with contractual arrangements, including participants in the energy trading market, actions of rating agencies, including changes in the ratings of debt, the impact of volatility in the capital markets on the value of the investments held by the pension, other postretirement benefit plans, captive insurance entity and nuclear decommissioning trust and the impact of such volatility on future funding requirements, accounting pronouncements periodically issued by accounting standard-setting bodies, and other risks and unforeseen events, including wars, the effects of terrorism (including increased security costs), embargoes, naturally occurring and human-caused fires, cyber security threats and other catastrophic events.

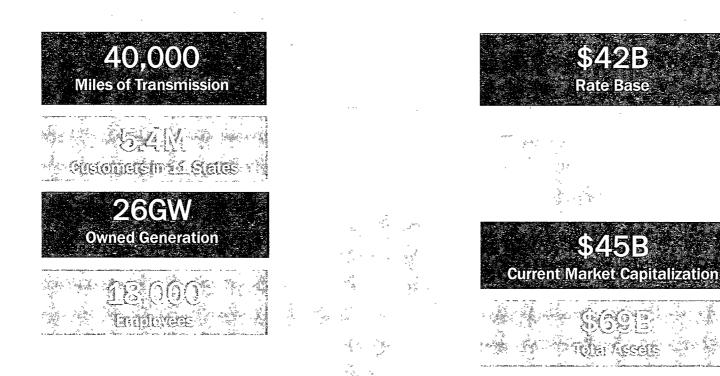
INVESTOR RELATIONS

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The Premier Regulated Energy Company

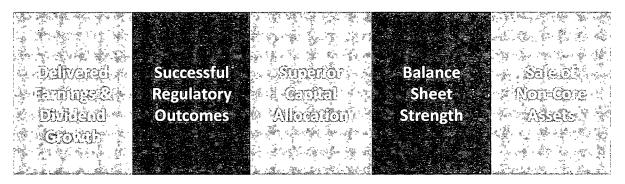




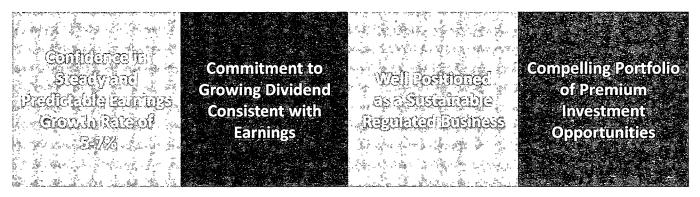
Statistics as of December 31, 2018 except for market capitalization as of August 27, 2019



Strong Execution Track Record



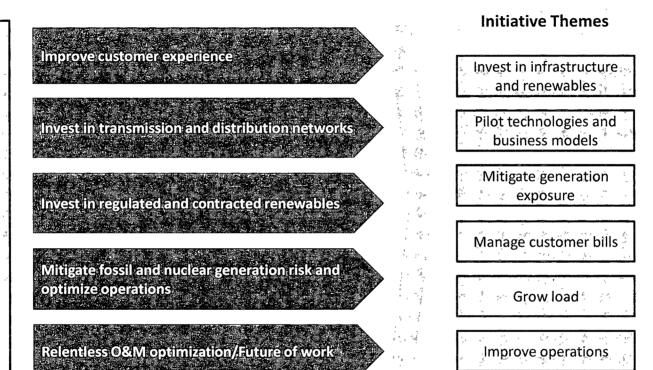
AEP Leading the Way Forward



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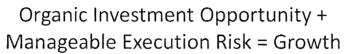
Execute Strategy.

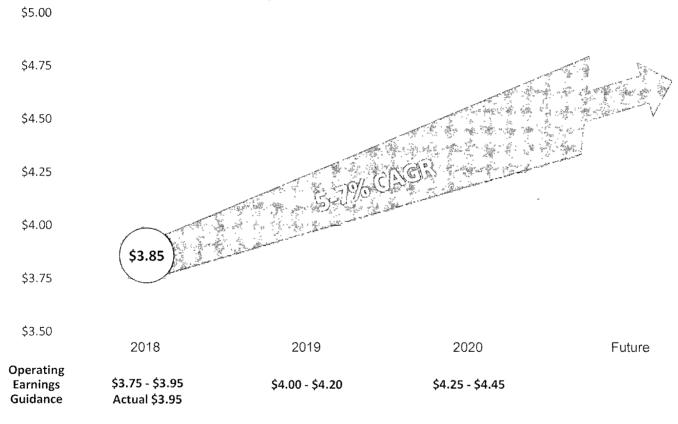


We are focused on executing our strategy while improving the customer experience

Operating Earnings Guidance



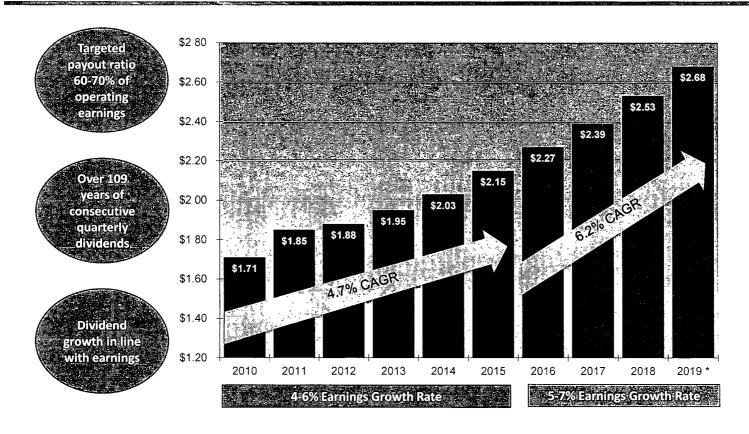




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Strong Dividend Growth



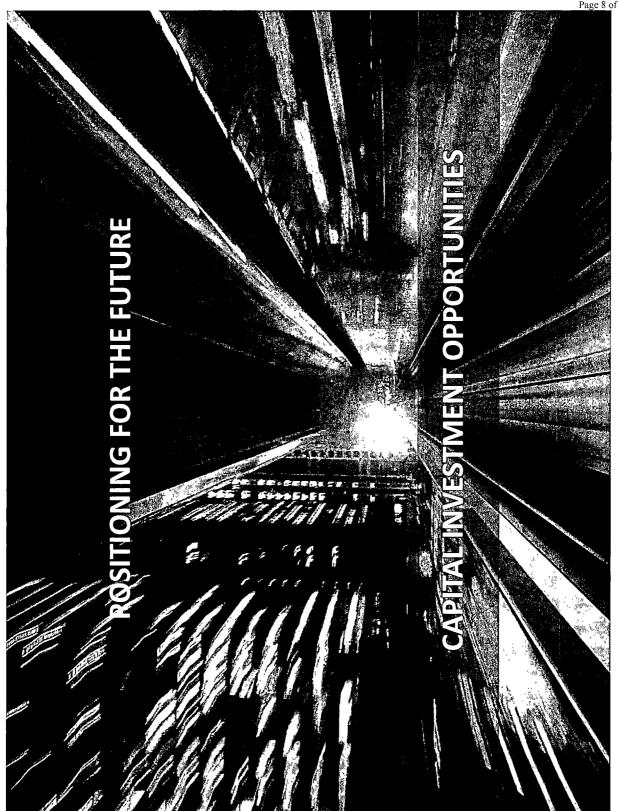


EPS Growth + Dividend Yield = 9 to 10% Annual Return Opportunity

* Subject to Board approval

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Robust Organic Capital Opportunities



	· · · · · · · · · · · · · · · · · · ·
· 自己的意义 ************************************	Grid modernization, aging infrastructure, physical/cyber
Transmission	security, reliability, market efficiency and economic
	development projects
· 大车大块大车工程	the series of th
	· 美国教育、全国、首的教育等等的专项等的、基础、基础、基础、基础、
A DO F TO BE	Grid modernization, reliability improvement projects
 Distribution 	and distribution station refurbishment
· · · · · · · · · · · · · · · · · · ·	医多种性性 医多种性性性性性性性性性性性性性性性性性性性性性性性性性性性性性性性
E TO THE PROPERTY OF THE PARTY	Regulated renewables supported by integrated resource
Renewables	plans and contracted renewables
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Technology	Digitization, automation, cyber security, enterprise-wide
	applications
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2019-2023 Capital Forecast of \$33B and Net Plant

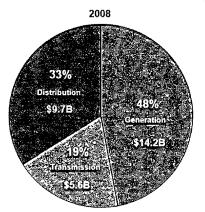


2019-2023 Capital Forecast

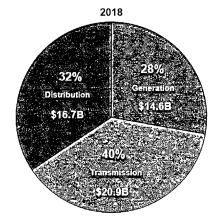
Regulated **Regulated Renewables** Environmental \$0.5B | 1% Generation Regulated Fossil/Hydro_ \$1.1B | 3% Generation Contracted Renewables \$1.0B | 3% \$2.2B | 7% **Nuclear Generation** \$0.5B | 2% Corporate. \$2.8B | 9% of capital allocated to regulated businesses **AEP Transmission** and contracted Holdco \$8.3B | 25% renewables allocated to wires 58.3B | 25%

Focus on wires and renewables

Historical Net Plant Profiles



Total \$29.5B



Total \$52.2B

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2019-2023 Capital Forecast by Subsidiary



كالأشالات (عطاطاية ١٨٤٤)	20/03	20203	阿爾 语	यक्ष्यव	2023[3	ilotali
Appalachian Power Company	\$821	\$786	\$847	\$939	\$875	\$4,267
Wheeling Power Company	\$42	\$43	\$52	\$56	\$33	\$226
Kingsport Power Company	\$17	\$15	\$21	\$19	\$25	\$97
Indiana Michigan Power Company	\$647	\$609	\$611	\$519	\$506	\$2,892
Kentucky Power Company	\$220	\$229	\$227	\$228	\$226	\$1,130
Ohio Power Company	\$720	\$554	\$600	\$640	\$694	\$3,208
Public Service Company of Oklahoma	\$339	\$365	\$338	\$487	\$450	\$1,978
Southwestern Electric Power Company	\$421	\$473	\$523	\$587	\$675	\$2,679
AEP Texas Company	\$1,271	\$1,031	\$1,069	\$1,146	\$1,245	\$5,763
AEP Generating Company	\$72	\$40	\$29	\$24	\$10	\$175
AEP Transmission Holdco	\$1,590	\$1,536	\$1,578	\$1,719	\$1,829	\$8,252
Generation and Marketing	\$1,627	\$127	\$183	\$132	\$133	\$2,202
Other	\$10	\$6	\$6	\$6	\$4	\$32
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Capital plans are continuously optimized which may result in redeployment between functions and companies. Table may not foot due to rounding.

DAH Docket No 473-21-0:
PUC Docket No 51-

Cash Flows and Financial Metrics



\$ in millions		2019E		2020E		2021E		2022E
Cash from Operations	\$	4,700	\$	4,900	\$	5,300	\$	5,800
Capital & JV Equity Contributions *		(7,300)		(5,800)		(6,100)		(6,500)
Other Investing Activities		(300)		(400)		(100)		(100)
Common Dividends **		(1,300)		(1,300)		(1,300)		(1,400)
Excess (Required) Capital	\$	(4,200)	\$	(2,600)	\$	(2,200)	\$	(2,200)
Financing								
Excess (Required) Capital	\$	(4,200)	\$	(2,600)	\$	(2,200)	\$	(2,200)
Debt Maturities (Senior Notes, PCRBs)		(1,100)		(900)		(1,500)		(1,600)
Securitization Amortizations		(300)		(200)		(100)		(100)
Equity Units ***		800		-		-		-
Equity Units Conversion		-		-		_		800
Equity Issuances - Includes DRP/401(k)		100		100		100		500
Debt Capital Market Needs (New)	\$	(4,700)	\$	(3,600)	\$ 4	(3,700)	\$	(2,600)
Financial Metrics								
Debt to Capitalization (GAAP)	uz uz			55% - 6		м ,	, 1	**
FFO/Total Debt (Moody's)	į.		di _{e d}	(Mid Te	ens	F NA H	Ĩ* -	, å '*

^{*} Estimates are based on current capital expenditure program. 2019 capital expenditures reflect \$551M purchase price and excludes recently announced contracted renewables transaction minority interest and JV project debt

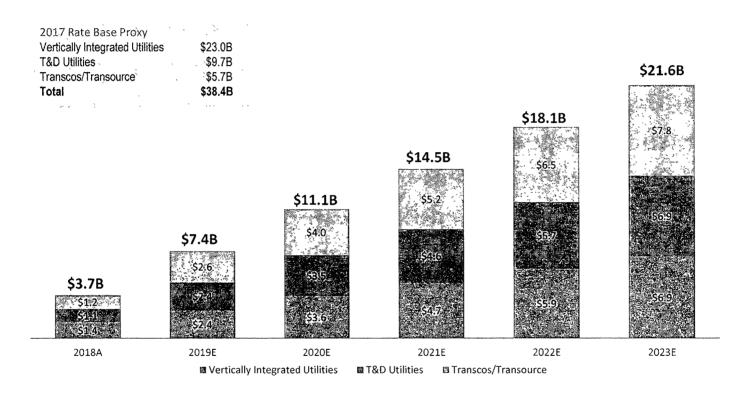
^{**} Common dividends \$2 68/share 2019-2022 Dividends evaluated by Board of Directors each quarter, stated target payout range is 60%-70%.

^{*** \$700}M offering and exercise of over-allotment.

7.8% CAGR in Rate Base Growth



Cumulative Change from 2017 Base



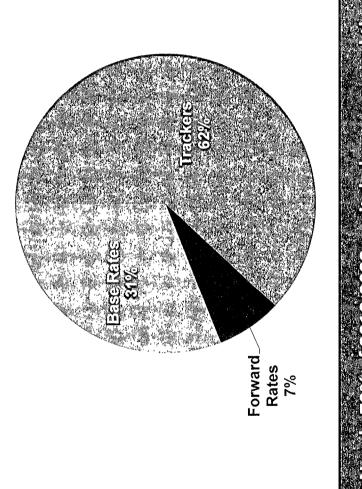
5% - 7% EPS growth is predicated on regulated rate base growth

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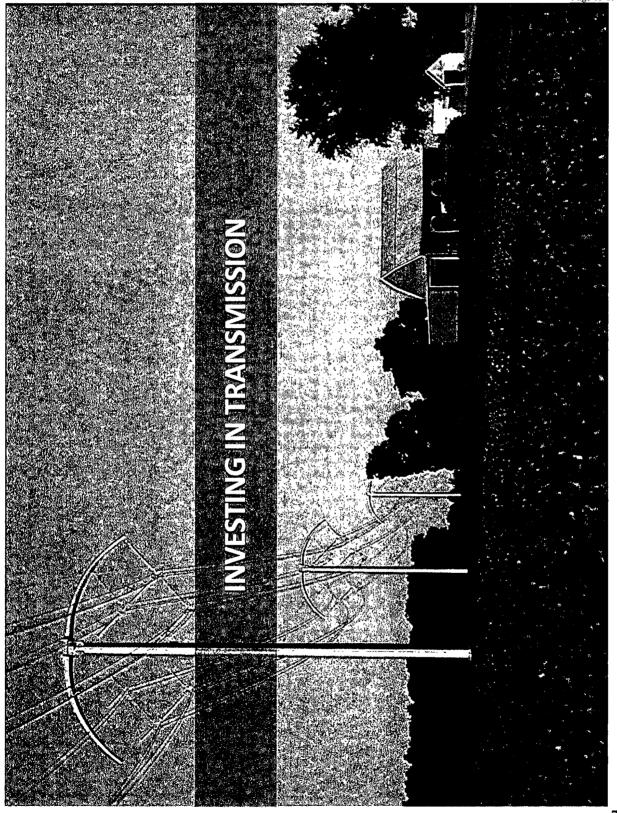
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Efficient Cost Recovery Mechanisms





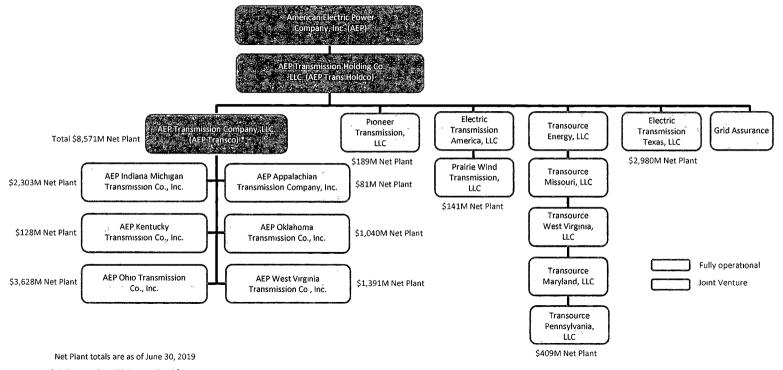


AEP Transmission Holdco Legal Entity Structure



AEP Transmission Company, LLC (AEP Transco) is wholly-owned by AEP Transmission Holding Company, LLC (AEP Trans Holdco)

AEP Trans Holdco is a wholly-owned subsidiary of American Electric Power Company, Inc. (AEP), one of the largest utility holding companies in the U.S.



^{*} Debt issued at AEP Transco level for transmission companies

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Strategy	Execution	Results
Infrastructure Investment	Targeted Capital Investments Local Reliability, Telecom modernization, Asset Health	Improved Reliability/Resiliency Earnings Growth Efficient Cost Recovery
Customer Experience	Improve Reliability, SCADA technology, security across the transmission system, Economic Development	Modernize grid reducing equipment failures/outages, community impact, customer relations
Innovative Technologies/Solution:	G&T Integrated BOLD Solutions Public Power ASSURANCE Solutions	Industry Leadership Customer Solutions
Non-Traditional Growth	Pronegri Praule Wind Transmission TRANSOURCE. Entre Transmission Fatas	Investment & Customer Diversity

The nation's largest transmission services provider is focused on delivering its \$3 billion annual capital plan to improve customer reliability and grid resiliency while meeting earnings growth targets through diversified investments.

AEPTHC Target Earnings 2018 - 2021





Over \$13B projected by 2021 (AEP Transcos and the ownership percentage of Transource)

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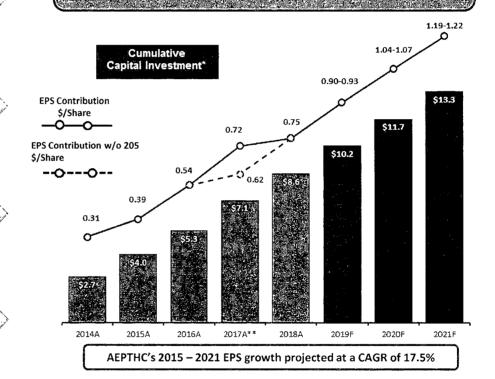
Affiliate authorized ROEs ranging from 9.6% to 12.8%

Authorized capital structure 40-60% equity

Portfolio Diversification Five Transcos and ETT contributed 95% of total 2018 earnings (81% and 13% respectively)

Industry & Technology Leader Bringing innovation and collaboration to the industry through Grid Assurance, BOLD and Asset Health

AEPTHCEPS contribution grows from \$0.31 in 2014 to \$1:19 \$1.22 in 2021



* Capital investment excludes Transource unapproved projects, JV equity contributions, BOLD and Grid Assurance.

** In addition to forward looking rates, 2017 includes a historical true up for East Transcos. Having both in one year is a one time occurrence.

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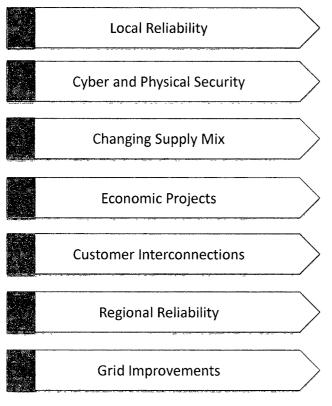
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Transmission Investment Drivers



Key Transmission Investment Drivers



Typical 2018-2023 Project Examples

- Flushing-Smyrna (OH) construct 13 miles to alleviate thermal overload
- Sheridan Project (WV) 10M T outage minutes in last 3 years
- Greenland-VBI North (OK) replace 41 mile, 1938-vintage line
- Roanoke Project (VA) replace aging circuit breakers at 4 stations
- Install physical security at critical Ohio EHV stations \$220M
- Install physical security at critical ERCOT stations \$40M
- Telecom Modernization fiber expansion for increased security
- Alamo (TX) connect 114MW solar farm
- Cactus Flats (TX) connect 150MW wind farm
- Transource IEC Project (PA/MD) reduce congestion costs by \$620M over 15 years
- Oklahoma serve ~80MW increased load at gas plant
- Columbus, OH serve new data centers
- Lotebush (TX) new station for Permian Basin load growth
- La Palma Station (TX) regional reliability to support peak demand
- Thorofare Project (WV-Transource) regional reliability
- Jackson's Ferry 765kV SVC (VA) high voltage during light load
- Brackettville-Escondido (TX) improve reliability in Eagle Pass
- SCADA Expansion (APCo) \$10M SCADA in remote stations
- Kenzie Creek (MI) replace switches with breakers
- Telecom Modernization Program extend to additional stations
- AEP's 15 state asset base serves as the foundation of the nation's electric system. FERC's support of transmission investments recognizes the critical function transmission plays in the power delivery system.

Transmission Investment Categories

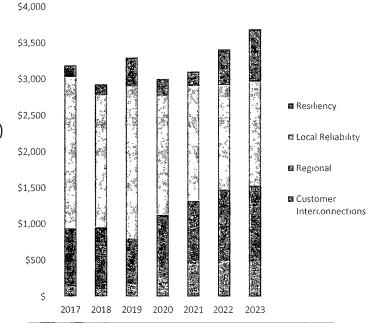


As the foundation of the power system, transmission integrates generation and loads across large regional footprints.

- Growing complexity of the integrated power grid: distributed generation, diversity in generation fleet, location and variability of generation
- System operations: Systems operating close to feasibility limits are more vulnerable (failures/intelligent adversaries)
- Survivability: Systems ability to survive contingencies without customer interruption

Major Issues Being Addressed

- Aging transmission facilities in poor condition
- Reduction of radial transmission sources
- **NERC/RTO** requirements
- Decrease customer exposure to Transmission outages
- Improve response time
- Enhance operability of the system

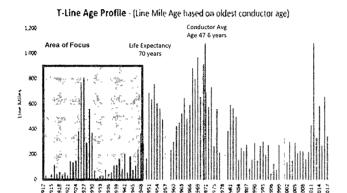


2017-2023 Investment = \$22.6 Billion

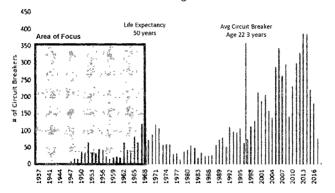
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Robust Transmission Capital Expenditure Opportunities







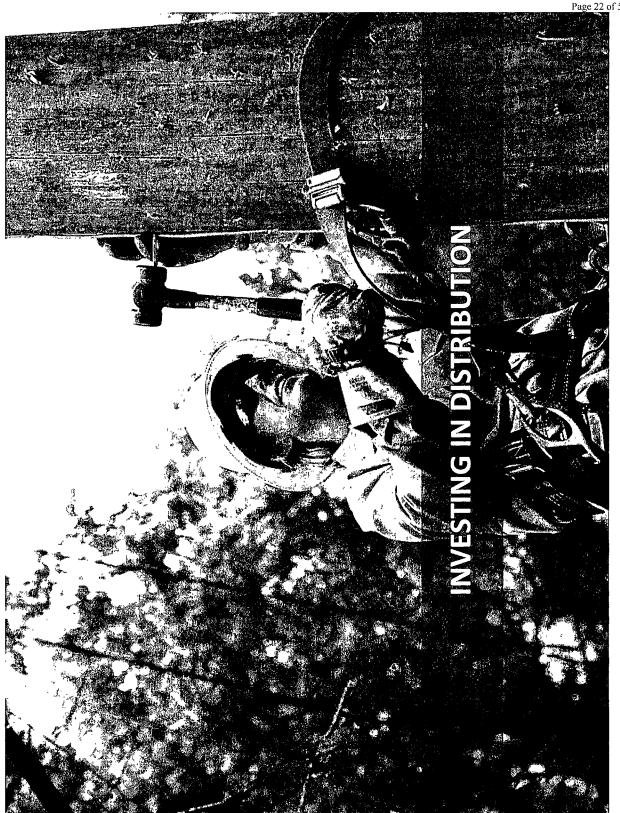


Transmission	Line Miles	Transformers	Circuit Breakers	
Life Expectancy (years)	70	60.	50,	
Current Quantity over Life Expectancy	6,085	234	998	
Quantity that will exceed Life Expectancy in next ten years	5,057	* 1	653	
Total Renewal Opportunity over ten years	11,142	367	1,651	

\$2.3 billion of annual investment. addresses the facilities past their. estimated life, expectancy; the asse age profile changes with actual, investment:

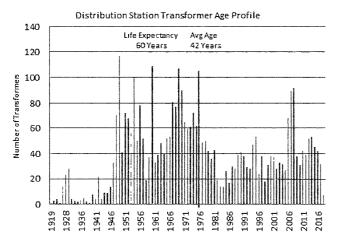
Scope and scale of AEP's Transmission network results in sustainable investment opportunity without risk of over-investment

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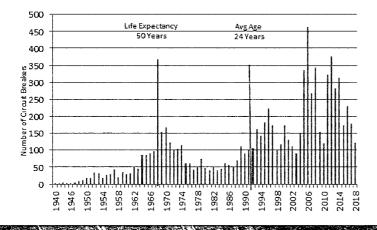


Robust Distribution Capital Expenditure Opportunities









Distribution	Station: Transformers	Circuit Breakers
Life Expectancy (years)	60	50
Current Quantity over Life Expectancy	923	993
Quantity that will exceed Life Expectancy in next ten years	514	977
Total Renewal Opportunity over ten years	1,437	1,970

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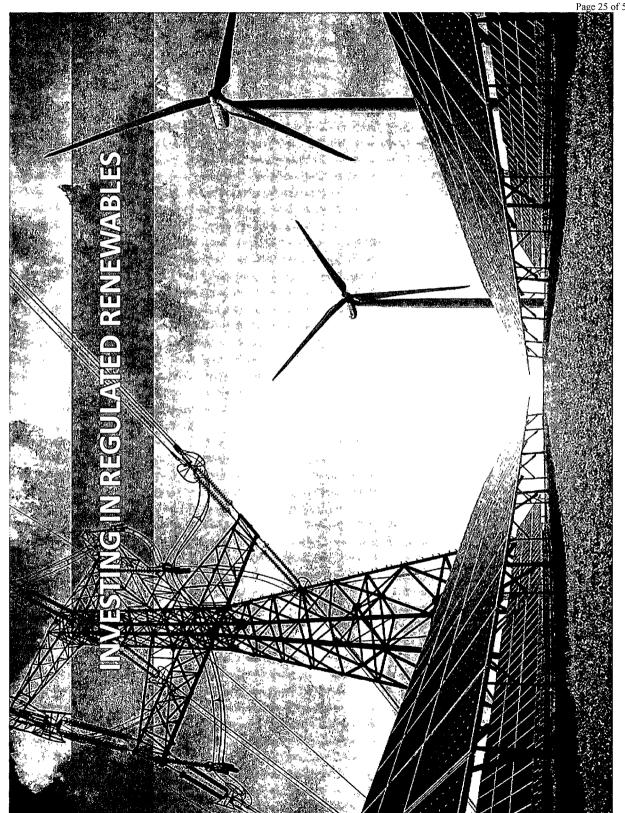
Examples of Incremental Distribution Investment Opportunities



- Grid Modernization
 - Distribution SupervisoryControl and Data Acquisition
 - Smart Circuits
- Distribution Line Re-Conductoring
 - Replace deteriorated small wire
 - Increase capacity to facilitate ties for smart circuits
 - Over 86,000 miles of small wire is in service across the operating companies (age profile at least 40 years)

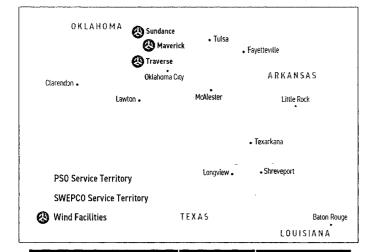
- ❖ Pole Replacement Programs
- Obsolete Station Breaker Replacements
- Capacity/Reliability Projects
- Distribution Station Transformers

Represents ~ \$500M/year of incremental investment opportunity to improve system reliability and modernize the system



North Central Wind Overview





PSO (P	UD 2019-00048)	675	45.5%
SWEPC	CO – AR (19-035-U)	155	10.4%
SWEPC	CO ~ LA (U-35324)	268	18.1%
SWEPC	CO – TX (49737)	309	20.8%
SWEPC	CO FERC	78	. 5.2%
	Tota	al: 1,485	100%
7/15/19 Filings in AR, LA, OK & TX	Q3 2019 – Q3 2020 Regulatory Activity	<u>Dec 2020</u> Sundance completion & purchase	<u>Dec 2021</u> Traverse & Maverick completion & purchase
	in the second second		
	2 019	■ 2020	2 021

MW

% of Project

Regu	SWEPCO	O and PS restmen			
Total Rate Base Investment		~\$2 bi	llion (1,485 MW)	en	
	<u>Name</u>	MW	Investment	In-Service	
North Central Wind	Sundance	199	\$307M	EOY 2020 (100% PTC)	
	Traverse	999	\$1,287M	EOY 2021	
	Maverick 3	287	\$402M	(80% PTC)	
Net Capacity Factor	44.0%				
Customer Savings	~\$3 billion (30-year nominal \$)				
Developer	Invenergy				
Turbine Supplier	GE				
Regulated rate bas meaningfully reduce			rtunity with ability	to	

- Acquiring facilities on a fixed cost, turn-key basis at completion
- Contingent upon satisfactory regulatory approvals
- ☐ Investment not included in the Company's current capital expenditure plan
- Acquisition can be scaled, subject to commercial limitations, to align with individual state resource needs and approvals

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Jurisdiction (Docket #)

AEP Ohio - Solar Project Filing



- ☐ Two solar REPAs with both facilities on line by end of 2021:
 - > Highland Solar, 300 MW
 - > Willowbrook Solar, 100 MW
- ☐ Debt Equivalency Cost Mechanism to provide recovery for use of Balance Sheet (approximately \$6M annually)
- Green Tariff that allows all customer classes the opportunity to purchase RECs to cover some or all of their generation supply
- ☐ Analysis resulted in nominal savings of over \$200M over the life of the projects when considering base band pricing



D Ohio Power Service Territory

Projected Resource Additions



	Solar Additio	ns (MW) ≹e	\$		Wind Additio	ns (MW) 🙎	9
Operating Co:	2020- 2022	2023- 2027	2028- 2030	Operating Co:	2020- 2022	2023- 2027	2028- 2030
AEP Ohio	400 *	-	-	AEP Ohio	500 *	-	-
APCo	15	300	750	APCo	±	300	_
1&M	150	600	550	1&M	300	150	300
KPCo	20 *	[*] 30	40	KPCo	-	- .	
PSO	11	600	600	PSO	675 *	400	200
SWEPCO		<u>.</u> '	300	SWEPCO -	810 *	600	· -
Totals	596	1,530	2,240	Totals	2,285	1,450	500

* Subject to regulatory filings currently underway

N.	tural Gas Add	litions (MW)	
Operating Co:	2020- 2022	2023- 2027	2028- 2030
I&M	18	18	788
PSO .	373 ⁽¹⁾	410 (1)	<u>.</u> -
Totals	391	428	788

(1) To replace expiring PPA

Total Project	ted Resource ns (MW)
Resource	2020-2030
Solar	4,366
Wind * *	4,235
Natural Gas	1,607
Totals	10,208

Updated 08/01/2019

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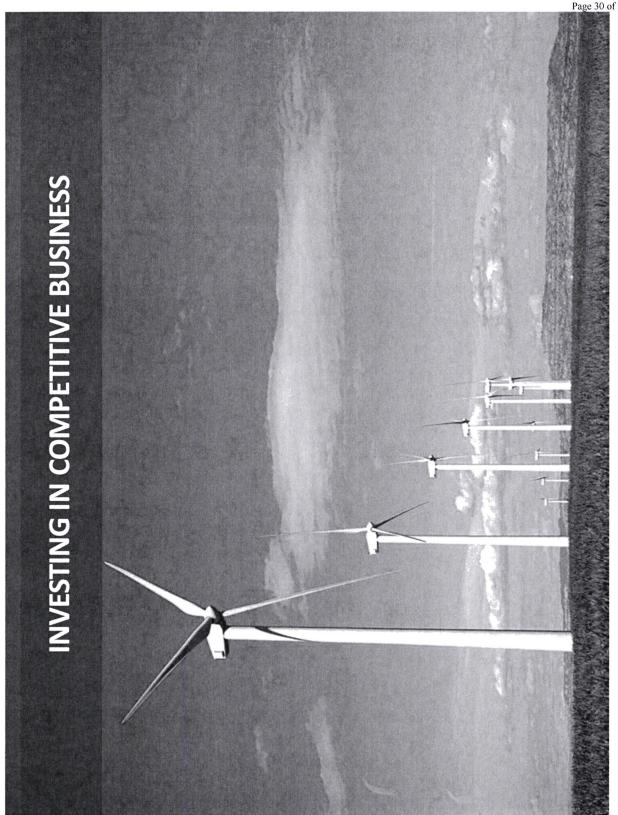
Integrated Resource Plan Status

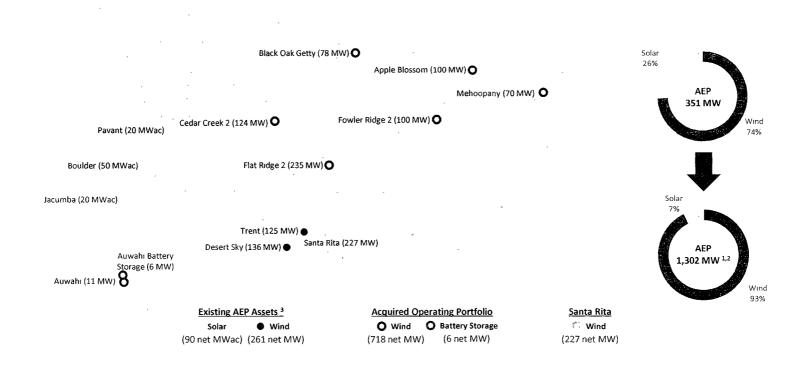


	IRPs Underway/Planned				
Previously Approved IRPs	Q4-18	Q1-19	Q2-19	Q3-19	Q4-19
AEPOHIO An AEPOmpany BOUNDLESS ENERGY	SOUTHWESTERN ELECTRIC POWER COMPANY 12/14/18 (AR)		APPALACHIAN POWER AN AEP Congain 50 INDUST (MIRC) 5/1/19 (VA)	SOUTHWESTERN ELECTRIC POWER COMPANY	KENTUCKY POWER
KENTUCKY POWER A AIP COME.	PUBLIC SERVICE COMPANY OF OKLAHOMA 12/21/18		July / Aug 2019	8/15/19 (LA)	12/20/19

Next IRP filing date for APCo (WV) is January 2021

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Projects complement AEP's existing footprint of large scale renewable projects in the contracted renewable space: Texas (488 MW, wind)¹, California (20 MW, solar), Nevada (50 MW, solar) and Utah (20 MW, solar)

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¹ Includes recent purchase of 75% interest in 302 MW Santa Rita East Wind Project currently under construction in west of San Angelo, Texas | ² Includes 6 MW of Auwahi battery storage | ³ Excludes AEP OnSite Partners Note: MWs in map reflect net capacity

Overview of Recently Announced Contracted Renewables Transaction



Transaction Overview

Operating Portfolio

- 724 net MW operating wind portfolio across seven states (CO, HI, IN, KS, MI, MN, PA) ¹
 - Five of seven wind assets owned 50 / 50 with BP Wind Energy
- Long-term PPAs with A/A2-rated ² counterparties & 16 years remaining life ³
 - 21% of PPAs with AEP Ohio, SWEPCO, and Indiana Michigan Power

Transaction Value Approvals & Timin

- \$1.05B enterprise value including assumption of \$470M of existing project debt & tax equity
- Closed in April 2019 with approvals from the FERC and Hart-Scott-Rodino clearance

Strategic Rationale and Investment Highlights

Expands Contracted Renewables Footprint

Strong Financial Fit

Growth Platform

- Enhances renewable platform scale and diversity, increasing industry participation in a market we expect to continue to grow
 - The acquisition, in addition to Santa Rita East Wind, increases AEP's contracted large scale renewable generation portfolio by 951 MW 4 to 1,302MW
 - Accelerates and de-risks \$2.2B planned renewable investment commitment through 2023
- Assets are located in known markets where we already have generation assets or utility operations
- Transaction expected to be immediately accretive to EPS in first full year by a few cents
 - Further solidifies our long-term EPS growth guidance of 5% 7%
- Tax efficient transaction as our tax appetite allows for monetization of transaction tax attributes, including production tax credits
- Development pipeline of the portfolio of up to 1 GW provides potential for incremental growth opportunities

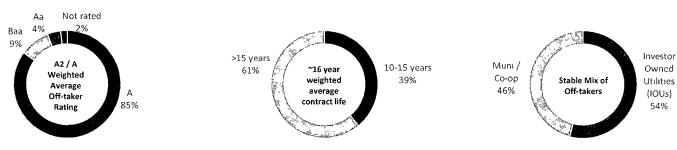
1724 net MW includes 6 MW battery storage at the Auwahi project | 2 Credit ratings as of 10/8/2018 Maui Electric Company is not rated by Moody's and is rated BBB- by S&P. As such, Maui is shown in the Baa3 category in the pie chart on slide 32 (corresponding Moody's category) for illustrative purposes | 3 Weighted average remaining contract life and asset age as of 12/31/2018 | 4 Includes recent purchase of 75% interest in 302 MW Santa Rita East Wind Project currently

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Details of Recently Announced Contracted Renewables Transaction



	Asset	MW Net ¹	Off-taker	COD	PPA Expire	Turbine	O&M
Fowler Ric	dge 2 (IN)	100	AEP ONIO VECTREN MICHIGAN SOLVER	2009	2029		Vestas
Cedar Cre	ek 2 (CO)	124	Xcel Energy	2011	2035	STROHOER	Vestas
Flat Ridge	2 (KS)	235	dáci (Esta Opera-	2012	2036		88
Mehoopa	ny (PA)	70	ODEC SAMECO	2012	2032	8	8
Auwahi (F	н)	11	Maui Electric	2012	2032	SIEMENS	SIEMENS
Total		540					
Black Oak	Getty (MN)	78	MMPA	2016	2036	Vestas	Vestas
Apple Blo	ssom (MI)	100	Consumers Energy	2017	2033	Vestas	Vestas
Total		178					
Overall To	otal	718 ²		**************************************	16 yrs ³		

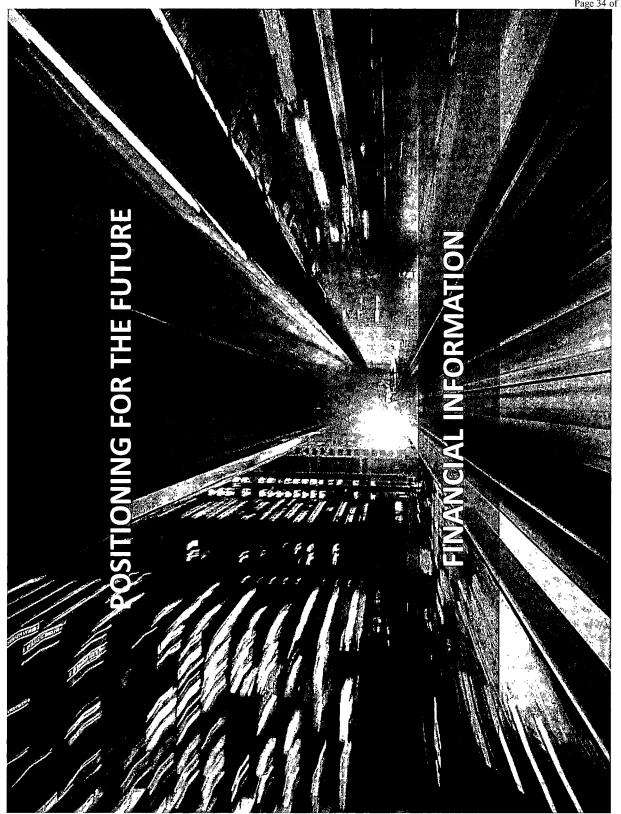


¹ Reflects AEP's share | ² Excludes 6 MW of Auwahi battery storage | ³ Based on weighted average contract life

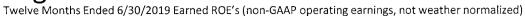
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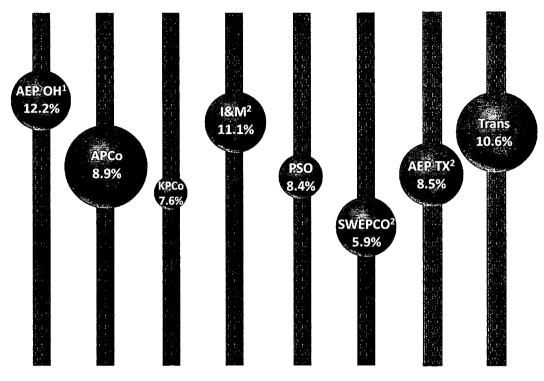
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Regulated Returns







Regulated Operations ROE of 9.7% as of June 30, 2019

 $^{\rm 1}$ Adjusted to reflect ROE after roll-off of legacy items | $^{\rm 2}$ Current base rate cases

Sphere size based on each company's relative equity balance

AEP Annual Review | - aep com

YE

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Current Rate Case Activity



AEP Texas

 Docket #:
 49494

 Filing Date:
 05/01/2019

 Requested Rate Base:
 \$5.0B

 Requested ROE:
 10.5%

 Cap Structure:
 55%D / 45%E

Revenue Increase: \$35M
Test Year: \$12/31/2018

Procedural Schedule:

Hearing 08/20/2019
Expected Effective Date First quarter 2020



I&M - Indiana

Docket #: 45235
Filing Date: 05/14/2019
Requested Rate Base: \$4.9B
Requested ROE: 10.5%

Cap Structure: 53.2%D / 46.8%E

Gross Revenue Increase: \$172M

(Less \$78M D&A)

Net Revenue Increase: \$94M

Test Year: 2020 Forecasted

Procedural Schedule:

Intervenor Testimony 08/20/2019
Rebuttal Testimony 09/17/2019
Hearing 10/07/2019
Expected Effective Date March 2020



Current Rate Case Activity (continued)



I&M – Michigan

Docket #: U-20359
Filing Date: 06/24/2019
Requested Rate Base: \$1.2B
Requested ROE: 10.5%

Cap Structure: 53.6%D / 46.4%E

Gross Revenue Increase: \$58M

(Less \$6M D&A)

Net Revenue Increase: \$52M

Test Year: 2020 Forecasted

Procedural Schedule:

Staff and Intervenor Testimony 10/17/2019
Rebuttal Testimony 11/12/2019
Hearing 11/21/2019
Expected Commission Order 04/24/2020



SWEPCO - Arkansas¹

Docket #: 19-008-U
Filing Date: 02/28/2019
Requested Rate Base: \$1.2B
Requested ROE: 10.5%

Cap Structure: 49.5%D / 50.5%E

Gross Revenue Increase: \$46M²

(Less \$12M D&A)

Net Revenue Increase: \$34M Test Year: \$21/2018

Procedural Schedule:

Rebuttal Testimony 08/20/2019
Hearing 10/21/2019
Expected Effective Date January 2020

² Does not include \$29M of current riders moving to base or \$12M for the requested Distribution Reliability Rider

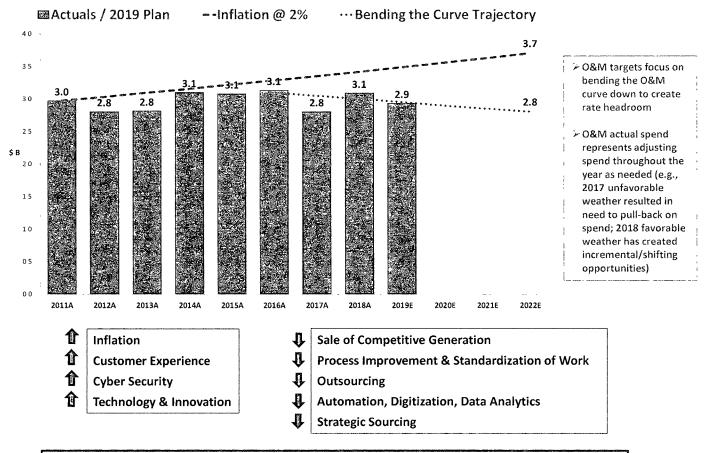


PUC Docket No 51-ARD's 3rd, Q CARD Attachmen

¹ This filing provides SWEPCO's notice of election to move to an annual formula rate review mechanism

Bending the O&M Curve While Achieving Our Strategic Goals

AMERICAN ELECTRIC POWER



Our initiatives will help reduce the cost of the current ~4,000+ employees retiring or leaving over the next 5 years, thereby reducing O&M and allowing us to focus on more value added activities for our customers

Bending the O&M Curve (Initiatives)



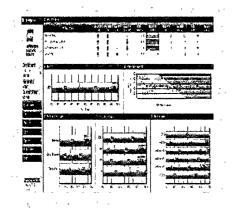
AEP Transmission Spacer Replacement Capital Program

- - The replacement program avoids approximately \$80M in O&M expenditures over time
 - ~150k spacers that are near or at end of life will be replaced as part of a capital program on nearly 1800 miles of 765kV lines over the next 10 years

AEP Station Check In/Check Out **Application**



- The first true mobile application of its kind saves valuable time for field technicians and dispatchers by eliminating nearly 90% of calls into the TDC from field staff entering or exiting secure facilities
- On average since implementation ~\$500K in labor savings on this activity have been realized



AEP Asset Health Centers

- ❖ Analytical software platform and fleet-wide asset monitoring device that provides instantaneous data through a robust communications infrastructure
- Real-time data helps in making data-driven operating decisions. Improves safety, reduces unplanned equipment outages, helps in planning and optimizing maintenance, and prioritizes renewal decisions about the condition of assets
- In use since 2014, AHC has provided performance data on equipment that has allowed Transmission to avoid \$36M and Generation over \$25M in costs related to equipment failure

Bending the O&M Curve (Initiatives)



Charge Initiative

~\$200M in digital and process-enabled savings over five years through O&M reductions/cost avoidance (50%), Capital Reduction/Efficiency (25%), Revenues (10%) & Operational Efficiency (15%)

Distribution/Transmission Field Time Reporting App – Mobile app/web that enables contractors to enter time digitally rather than through paper timesheets. Improves efficiency and reduces rewor (e.g., audits and audit outcomes).
Contract Digitization – Digital tools & associated analytics that reduce administrative, repetitive work performed by the contract support function.
Digitized Inspections – Combined use of drones, sensors, and digital user tools to minimize the physical labor associated with distribution, transmission, and generation inspections.
Transmission Capital Commissioning Checklist – Mobile app/web that enables employees and contractors to perform and complete commissioning tasks using handheld technology rather than through a paper process. Improves accuracy, increases operational efficiency, reduces rework, and accelerates time to place projects in service.

Other Initiatives

- Strategic Work and Workforce Planning
- Outsourcing Activities
- Tactical Sourcing through Procurement Management

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